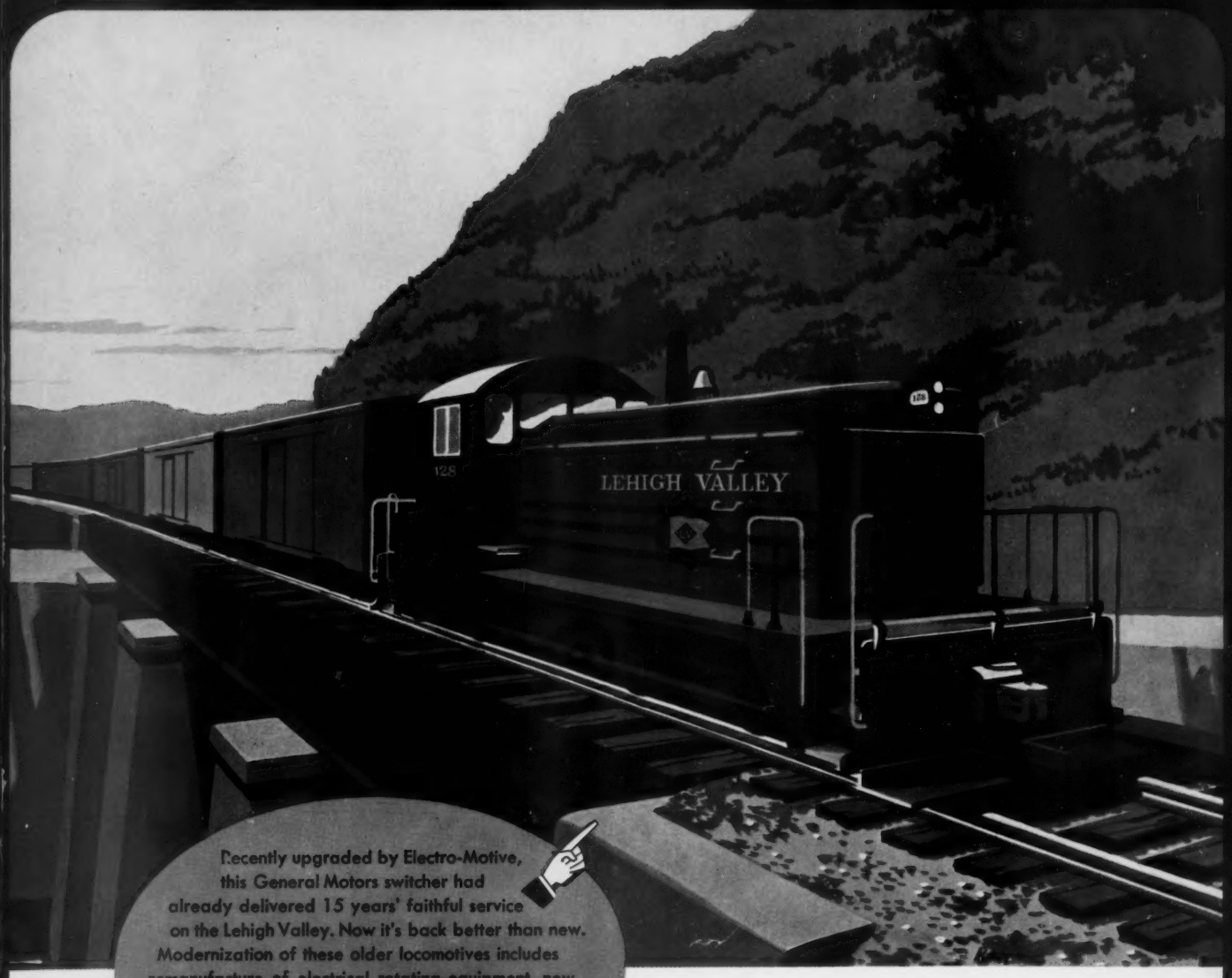
FEBRUARY 28, 1955

New Yard at Hamlet . . . p. 22

RAILWAY AGE

One of Five Simmons-Boardman Railway Publications



Recently upgraded by Electro-Motive, this General Motors switcher had already delivered 15 years' faithful service on the Lehigh Valley. Now it's back better than new. Modernization of these older locomotives includes remanufacture of electrical rotating equipment, new controls and replacement of the original 12-201A engine with a modern 8-567C Diesel. In the modified SW9, *eight cylinders do the work of twelve*—and that means lower cost.

Modernize and Economize

(For further information, see pages 18-19)

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Missouri Pacific's sleek Colorado Eagle provides pleasant overnight service between St. Louis and Denver.

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Distance seems to evaporate when the streamlined train pulls out of the terminal and heads for open country. With every comfort at hand, and with scenic wonders right outside his window, the passenger travels de luxe and the miles are short.

Good travel is a combination of many things, all working together. Some, like wheels, are rarely the object of passenger attention. But to the railroads, and to Bethlehem, wheels are so important that years of intensive research have been devoted to their improvement. Today Bethlehem wrought-steel wheels are rolling under "name" trains from coast to coast; are helping provide the luxury travel that these trains offer. They are wheels that can be installed with complete confidence, for you cannot buy finer ones anywhere.

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COMPANIONS TO BETHLEHEM FORGED-STEEL AXLES

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To serve the expanding needs of Pittsburgh's great steel mills, the Union Railroad has built a modern 23-track retarder classification yard. The new Mon Southern Yard is equipped with UNION Automatic Switching and Retarder Speed Control to speed car classification and assure maximum utilization of available yard space.

And these UNION automatic classification systems afford additional important advantages in expediting operation at Mon Southern Yard, where the operator's view is restricted due to curvature of the yard layout and interference by existing structures.

UNION Automatic Switching and Retarder Speed Control promotes efficiency . . . eliminates unnecessary delays and congestion . . . thereby greatly reduces costly switching at other interchange points and in the mill areas.

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DIVISION OF WESTINGHOUSE AIR BRAKE COMPANY

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February 28, 1955 **Vol. 138, No. 9**

Week at a Glance

SP is diversfying into the pipe line business. A subsidiary will build a line, largely on railroad right of way, between El Paso and Los Angeles. **8**

A positive approach toward their political problems, including subsidized competition, is urged on the railroads by Monon President Brown. The public just doesn't care about the railroads' predicament, he says. **14**

FORUM: "Traditional differentials" appear still to be controlling the regulation of railroad rate-making. The result, says the Burlington's L.R. Capron, is that rate orders are "impotent," because they don't bring about the equitable relationships required for effective competition. **21**

Hamlet Yard is the Seaboard's new $7.5-million contribution to better railroad service. Freight classification for practically the entire system is now performed at this central point, employing modern electronic and automatic appliances to do the work faster and better **22**

An advance in freight-car brakes is the Westinghouse AC valve, announced in *Railway Age* February 7 and described and illustrated herein. **27**

Water can be a burning issue—if it isn't at the right place at the right time. A fire protection specialist points to precautions that insure against property loss. **33**

BRIEFS

Presidential emergency board hearings of the "weight-on-drivers" graduated pay increase demand of the Order of Railway Conductors and Brakemen concluded in Chicago on February 23. Speaking for the carriers, Howard Neitzert, Chicago attorney, termed the con-

AIR COSTS MONEY!

Stop leakage with new WABCOSEAL® Angle Cocks

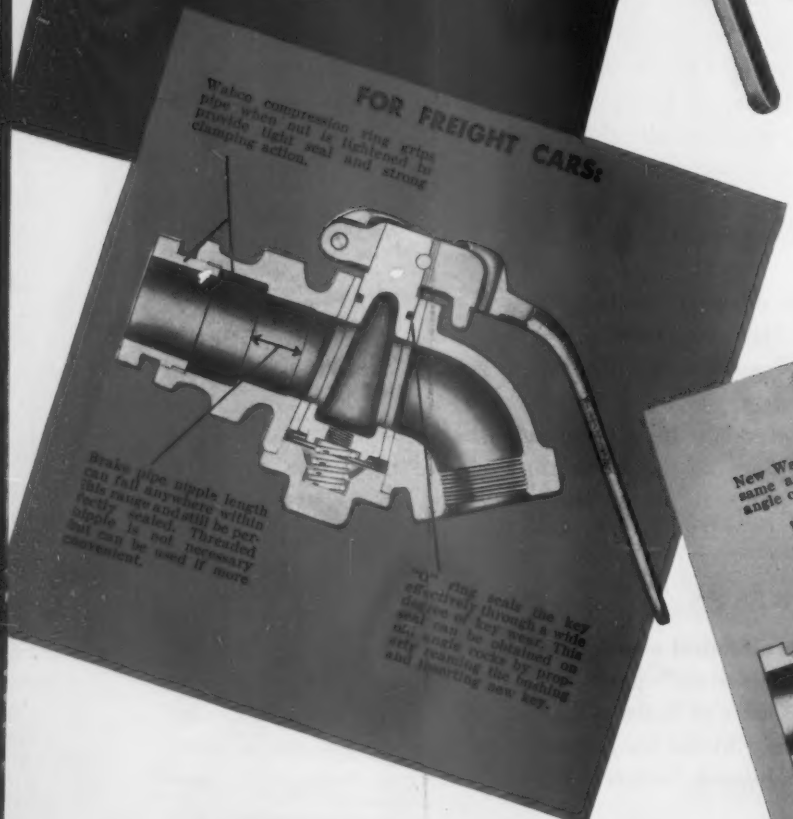
BRAKE pipe leakage increases compressor operation, lowers its efficiency and causes difficult train handling. Reduce leakage to the minimum by installing the *new* Wabcoseal Angle Cock shown here. Two styles are available—with or without spring-locking handle.

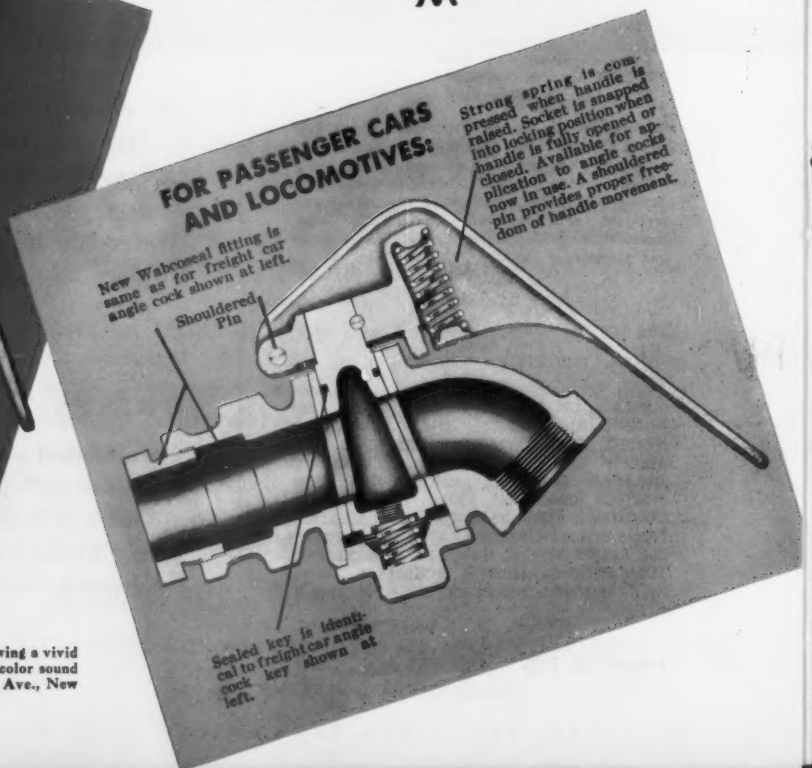
Heart of the new Wabcoseal Angle Cocks is the sealed key that stays tight through a wide degree of key wear. A Wabco compression ring replaces the standard tapped thread at the brake pipe end to give a positive seal. Also, adequate end tolerance is provided so brake pipe nipple need not be cut to precise length.

The passenger car and locomotive angle cock has a spring loaded handle that snaps the socket into locked position when handle is fully open or closed and keeps it there despite vibration and shock.

The sealed key and spring locking handle are available separately for application to present angle cocks.

Westinghouse Air Brake
COMPANY
AIR BRAKE DIVISION WILMERDING, PA.


FOR FREIGHT CARS:
Wabco compression ring grips pipe when nut is tightened to provide tight seal and strong clamping action.
Brake pipe nipple length can fall anywhere within this range and still be perfectly sealed. Threaded nipple is not necessary but can be used if more convenient.
"O" ring seals the key effectively through a wide degree of key wear. This seal can be obtained on old angle cocks by properly reaming the bushing and inserting new key.


FOR PASSENGER CARS AND LOCOMOTIVES:
New Wabcoseal fitting is same as for freight car angle cock shown at left.
Shouldered Pin
Strong spring is compressed when handle is raised. Socket is snapped into locking position when handle is fully opened or closed. Available for application to angle cocks now in use. A shouldered pin provides proper freedom of handle movement.
Sealed key is identical to freight car angle cock key shown at left.

NEW MOVIE AVAILABLE entitled, *"AT THIS MOMENT"*—showing a vivid story of modern railroad progress. Length 26 minutes, on 16 mm. color sound film. For use of film write: United World Films, Inc., 1445 Park Ave., New York or Association Films, Inc., 347 Madison Ave., New York.

Current Statistics

Operating revenues, twelve months	
1954	$9,370,905,784
1953	10,664,264,383
Operating expenses, twelve months	
1954	$7,384,226,784
1953	8,135,346,686
Taxes, twelve months	
1954	$ 861,147,306
1953	1,185,017,865
Net railway operating income, twelve months	
1954	$ 874,505,486
1953	1,109,350,754
Net income, estimated, twelve months	
1954	$ 666,000,000
1953	868,000,000
Average price railroad stocks	
February 21, 1955	90.25
February 23, 1954	61.84
Carloadings, revenue freight	
Six weeks, 1955	3,809,369
Six weeks, 1954	3,737,597
Average daily freight car surplus	
Wk. ended February 12, 1955	47,998
Wk. ended February 13, 1954	108,660
Average daily freight car shortage	
Wk. ended February 12, 1955	672
Wk. ended February 13, 1954	522
Freight cars on order	
February 1, 1955	18,395
February 1, 1954	27,959
Freight cars delivered	
One month, 1955	2,008
One month, 1954	4,944
Average number railroad employees	
Mid-January 1955	1,009,746
Mid-January 1954	1,107,995

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Week at a Glance CONTINUED

ductors "adequately compensated" and "not entitled to preferential wage increases." He asked the board to consider the demand "in the light of the unsatisfactory financial condition and future prospects of the railroads." The board may not make its recommendations to the President until sometime after March 15.

"Unitized loading"—the use of standard containers and pallets—together with such other shipping methods as piggyback, Seatrain, and roll-on, roll-off cargo ships, promise "a new era" in transportation, according to Brigadier General E. C. R. Lasher, of the Army Transportation Corps. He expects such modern techniques to have **"a very profound effect" not only on military** logistics but on commercial shipping as well.

An interurban mass rapid transit system may be the solution to the traffic problem of the San Francisco Bay area, R. F. Ziegenfelder, partner in the New York engineering firm of Parsons, Brinckerhoff, Hall & Macdonald, told the recent convention of the American Society of Civil Engineers. An alternative consideration is an extensive highway and parking lot expansion.

Considerable publicity has been given of late to figures which purport to show that total passenger traffic moving by air in 1954 exceeded total rail travel. The joker is that the air figures include *all* air travel—first class, coach, "nonsked," military, and even foreign. Rail figures cover *coach* travel only—not Pullman.

100 years ago February 12 grading was begun at Sacramento on a 23-mile railroad to be known as the Sacramento Valley. Today, as part of the Southern Pacific's Placerville branch, this century-old route is the oldest segment of the SP's western lines. A suitable centennial celebration will be staged in Sacramento August 9—to mark the 100th anniversary of the first rail laying.

Fifty-six railroad employees have been awarded the Presidential medal of honor for performing outstanding feats of heroism in saving the lives of others since the creation of this award in 1905.

It began as an experiment—but paid off for everyone concerned. That's why

"Trailiner" traffic increases 3200%

Anyone who doubts the future of trailers on flatcars should take a long look at the New Haven's Trailiner service. Starting in 1938—when 1,506 trailers were shipped—it has mushroomed to the point where seven separate Trailiner trains carried 50,255 trailers between New York, Boston, Providence, Springfield and New Haven during 1953.

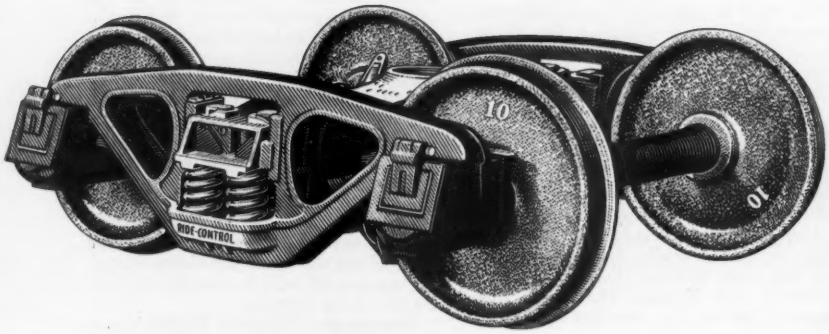
Dependable schedules are maintained by a fleet of 360 specially designed and constructed flatcars—all mounted on ASF Ride-Control Trucks. Result? Trailer and lading get a safe, smooth ride at almost passenger-train speeds. Using Ride-Control Trucks, experience has shown that if a trailer load rides safely to the New Haven yards, it rides safely on the flatcars.

And everybody benefits. The New Haven builds additional revenue. The truckers enjoy relief from highway hazards . . . they get balanced distribution of empties at lowest possible costs . . . and they've doubled the number of trailers used per tractor.

Today, Trailiner service is no longer an innovation. It's an outstanding example of progress . . . with two great transportation methods working together.

Trailiner flatcars receive greater utilization than practically any other freight cars in revenue service. The fleet of Trailiner cars will soon be enlarged with delivery of 100 new cars now on order. These new cars will also run on ASF Ride-Control Trucks—modified for use with roller bearings.

on the New Haven's "Iron Highway"



The "Trailiner" rides on

ASF

ride-control® trucks

AMERICAN STEEL FOUNDRIES

410 N. Michigan Avenue, Chicago 11, Illinois

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SP Entering Pipe Line Field

A new subsidiary will use railroad right of way for installation to handle petroleum products in an 800-mile system linking Texas, Arizona and California

In an unusual move toward diversification, the Southern Pacific will construct a $30,000,000 pipe line system, largely on its railroad right of way, and will operate the system as a public utility handling "white" products for the petroleum industry.

A newly formed subsidiary will construct all necessary facilities to provide service from refineries at El Paso, Texas, and in the Los Angeles area to the rapidly growing consuming territories centered at Phoenix, Ariz., and Tucson. Products to be transported include regular, premium and aviation gasolines, diesel oil and jet aircraft fuel.

Formation of the subsidiary, "Southern Pacific Pipe Lines, Inc.," was announced by D. J. Russell, president of the SP, in San Francisco on February 18. The new venture was in line with the company's aim to furnish complete land transportation service to shippers —by rail, truck or pipe line—Mr. Russell said. The use of the company's railroad right of way is a "great inherent advantage" and would place the SP in a position to serve all petroleum products distributors contiguous to SP rail lines, he stated.

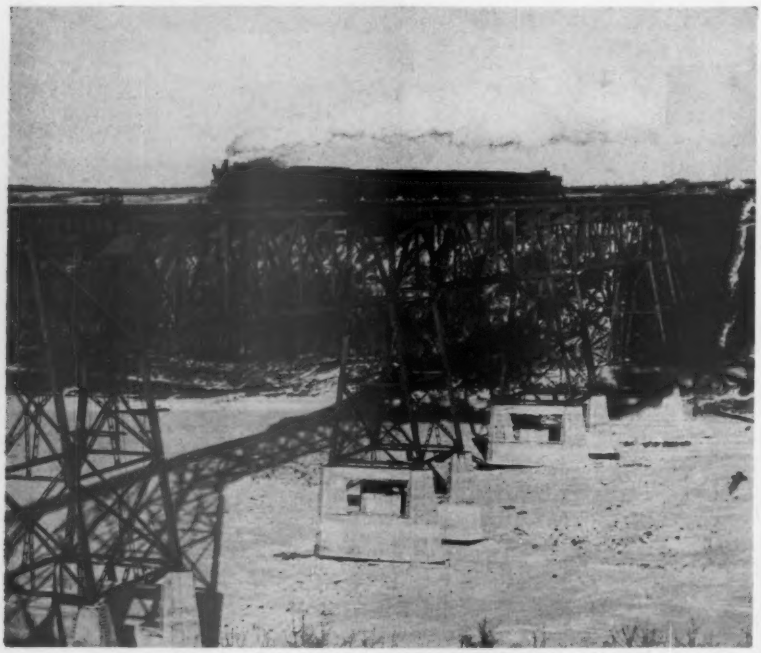
Growing Market—There are no refineries in Arizona and the movement of petroleum products into that state from both Texas and California refineries has reached the point where the construction of pipe lines is inevitable, Mr. Russell explained. The pipe line would generally follow SP right of way from Watson (Los Angeles) to Phoenix and Tucson. The Texas line would follow the shortest practical route utilizing SP right of way where it is economical to do so. A 16-in. pipe would connect the Watson refining area with Colton, Cal., and the line from that point would be 12-inch through to the Arizona terminal points. The Texas line would be about eight or ten inches in diameter.

Many petroleum companies have indicated that they will use the line, Mr. Russell said. Its initial capacity has been estimated at between 10 and 20 thousand barrels a day and with a potential increase in capacity of 50 per cent. It is expected that the line would cause a sharp reduction in the volume of petroleum products now being transported into Arizona via highway and it will also affect rail movements between these points. Present plans call for the subsidiary company's operations to be confined to the SP's own operating territory. The first service is expected by the end of this year. The undertaking will be financed largely through the sale of new securities and most of the steel and petroleum operating equipment will be purchased from Pacific coast sources.

Research—"Southern Pacific is convinced by its own studies, and by a market survey made for it by the Stanford Research Institute, that the pipe line project is a very desirable expansion and diversification of the railroad's interests and activities," the SP president stated. "It will enable us to get maximum use out of our private right of way, in line with continuing studies to increase utilization and financial return on such properties.

"By addition of pipe line facilities to our rail and truck operations, we will be able to offer the petroleum industry the service it desires in order to meet its various land transportation requirements. This situation, we believe, will be very desirable from the oil companies' standpoint."

Basic planning for the pipe line has been the undertaking of management engineers of the Bechtel Corporation, San Francisco.



FIRST TRAIN MOVES over a new steel bridge recently completed by the Canadian National across the Red Deer river, near Ardley, Alta., on the direct line between Edmonton and Calgary. The bridge is 158 ft high, one of the longest and highest on CNR lines in western Canada. It replaced a 40-year-old structure destroyed when ice jams rose to record levels in April 1952. The ice sheared off the steel towers above the concrete pedestals, dropping the bridge into the river.

Excessive Speed on Curve Caused B&M Derailment

The Interstate Commerce Commission has found that "excessive speed on a curve" caused the derailment of a Boston & Maine passenger train at Nashua, N.H., on November 12, 1954. The accident resulted in the death of one passenger, and the injury of 35 passengers, five railway mail clerks, and 13 members of the train crew.

The train involved was No. 302, the "Red Wing," southbound from Montreal to Boston. It consisted of a two-unit diesel-electric locomotive and eight

cars—all of "conventional all-steel" construction except the fifth, which was a lightweight-steel coach.

The derailment occurred on a 6-deg 35-min curve as the train was approaching Nashua station. The entire train left the rails. Speed on the curve was restricted to 30 mph, and the commission found that the train was traveling 70 mph at the time of the accident. It attributed the accident to the excessive speed because it determined that no conditions were present which would have caused the brakes to become inoperative.

"It appears," the report said, "that the speed of the train would have been properly controlled at the point of accident if braking action had been initiated a reasonable distance before reaching the point at which the speed restriction applied."

The commission's report, No. 3600 was by Commissioner Clarke.

Soo Line Begins "Piggyback" March 1

Trailerload piggyback service at truck-competitive rates and minimum weights, will be inaugurated by the Soo Line between the Twin Cities and the Wisconsin communities of Neenah, Menasha and Appleton.

A daily overnight service will be handled on regular fast freight schedules. The equipment consists of 52-ft flat cars handling two 24-ft trailers each.

Figures of the Week

683 Officers Were Paid $20,000 or More in 1953

Class I roads paid annual salaries and other compensation of more than $20,000 to 683 officers in 1953 for an aggregate of $22,799,220, according to a report of the Bureau of Transport Economics and Statistics, Interstate Commerce Commission.

The average salary paid to these executives came to $33,381, according to the report. There were only 643 of the "over $20,000" category in 1952, the report shows, with an aggregate of $21,532,619 and an average of $33,488. The 1943 comparisons are: 306 persons earning more than $20,000 with an average of $30,463 and an aggregate of $9,321,544.

Of the 683 persons listed in the bureau compilation, there were 28 whose earnings came to more than $70,000, including 10 who were paid more than $100,000.

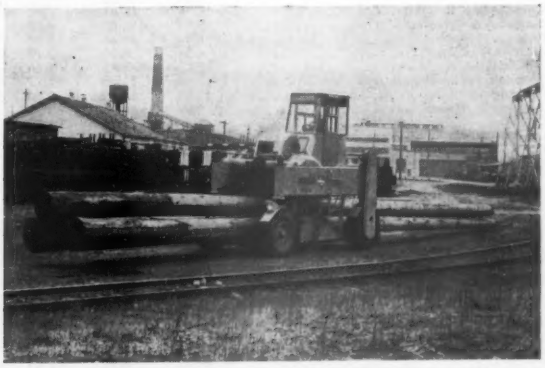
The bulk of these salaries went to personnel earning between $20,000 and $20,499, with 259 persons in this group aggregating $5,679,348 or 25.85% of the total. There were 139 persons paid more than $25,000 but less than $30,000, and 137 earning between $30,000 and $40,000. A total of 78 was paid more than $50,000.

The bureau also listed the top five salaries paid by each Class I road—including line-haul, switching and terminal companies — regardless of amounts. In some cases some or none of these salaries came to $20,000. These officers, plus those earning $20,000 or more, bring to 1,010 the number of officers reported on, as against 967 for 1952. Aggregate compensation for all these officers came to $26,659,991 for an average of $26,396 per person, compared with a total of $25,278,300 and an average of $26,141 for 1952.

ICC Publishes 7-Year Index of Freight Rates

The Bureau of Transport Economics and Statistics of the Interstate Commerce Commission has published its indexes of average freight rates on car-

USED AS A MOBILE FUELING UNIT, this Ross straddle carrier saves the Milwaukee time and money. The 1,000-gal drum is strapped to a pallet to avoid tipping when carrier travels over rough ground and is carried wherever needed for on-the-spot refueling of switching locomotives.



CARRYING LONG, AWKWARD SIGNAL POLES is no problem for this Ross straddle carrier, one of two 20,000-lb-capacity units the Milwaukee uses in its Milwaukee terminal. Poles and steel beams are carried on flat wooden pallets, and a once-difficult job is made easy.

Milwaukee Uses Straddle Carriers to Cut Costs of Materials Handling

Considerable reduction in the cost of materials handling as a result of the use of Clark Equipment Company Ross straddle carriers has been reported by the Milwaukee. At the road's Milwaukee terminal, location of the main shops and the General Stores division, two straddle carriers, with the aid of various types of pallets, handle such materials as signal poles, oil drums, scrap metal, steel beams and rubbish.

Long flat pallets are used for carrying signal poles, steel beams and barrels of oil. Length of poles carried does not matter, so long as they are balanced on the pallet, which is true also of steel beams and angular forms. Oil barrels are stacked on end and can be bound with rope or steel bands to assure stability if the load must be moved several times, or is to go over rough ground.

Scrap metal shavings are handled in a "pocket" pallet: A flat pallet fitted with a four-sided frame. Cross-braces set across the pallet deck between the two long sides divide the interior into four pockets for holding shavings of various metals. The pallet is set in a convenient spot in the machine shop and when full is carried to the scrap yard by a straddle carrier which also replaces the empty pallet.

Large wooden rubbish boxes placed around the yard have been adapted for carrier handling by fixing channels on each side to facilitate pickup by the carriers' load hooks.

Use of the straddle carriers has almost completely eliminated the need to have switching locomotives act as materials handlers. Such locomotives are used now only for movement of massive quantities of materials.

INDEXES OF AVERAGE FREIGHT RATES
For Inter- and Intrastate Rates by Commodity Group
(1950=100)

Item	Index						
	1947	1948	1949	1950	1951	1952	1953
INTERSTATE RATES							
All commodities	79	93	99	100	102	109	111
I. Products of Agriculture	80	93	98	100	102	108	110
II. Animals and Products	77	93	99	100	102	110	113
III. Products of Mines	82	91	98	100	102	108	109
IV. Products of Forests	78	92	98	100	102	110	112
V. Manufactures and Miscellaneous	78	94	101	100	102	110	112
INTRASTATE RATES							
All commodities	82	93	99	100	102	108	111
I. Products of Agriculture	80	92	97	100	102	110	113
II. Animals and Products	83	96	98	100	101	108	114
III. Products of Mines	84	93	99	100	102	107	108
IV. Products of Forests	84	95	98	100	102	111	116
V. Manufactures and Miscellaneous	80	95	100	100	102	108	111

load traffic for the years 1947 through 1953. The purpose of the indexes, of which this is the fourth published, is to measure changes in revenue attributable solely to changes in rates.

The accompanying table, taken from the report, shows that changes in some commodity-rate indexes for 1951 and 1952 have been made since the previous report (*Railway Age*, October 12, 1953, page 12). This is due, the bureau reported, to a revised method for computing the indexes. The change in procedure "resulted in only minor corrections" of the figures obtained in earlier years.

The indexes are based on the commission's waybill tabulations.

LARGE CLASS I RAILWAYS

ROAD	Percent net railway operating income of revenues		Percent revenues of total revenues in territory		Percent of total net railway operating income in territory	
Eastern district and Pocahontas region	1954	1953	1954	1953	1954	1953
Pennsylvania	5.66	7.23	21.43	22.33	14.36	16.08
New York Central	4.66	7.65	17.90	17.81	9.87	13.58
Baltimore & Ohio	7.80	9.50	9.55	9.95	8.81	9.41
Chesapeake & Ohio	17.19	17.41	7.69	7.43	15.64	12.88
Norfolk & Western	15.33	14.63	4.29	4.09	7.79	5.96
Erie	8.34	10.46	3.84	3.92	3.79	4.08
NYNH&H	6.17	6.02	3.79	3.56	2.76	2.13
NYC&StL	12.88	13.01	3.66	3.61	5.58	4.68
Wabash	11.04	11.05	2.77	2.64	3.63	2.90
Reading	12.31	12.72	2.76	2.87	4.03	3.63
Boston & Maine	3.99	6.06	2.05	1.92	.97	1.16
DL&W	9.00	11.36	1.99	1.93	2.11	2.19
Lehigh Valley	9.01	13.80	1.66	1.65	1.77	2.26
CofNJ	6.69	7.84	1.42	1.34	1.12	1.05
Grand Trunk Western	1.17	7.87	1.42	1.32	.20	1.04
Total (15 roads)	8.08	9.65	86.22	86.37	82.43	83.03
Southern region						
Illinois Central	10.24	10.68	20.25	20.34	17.55	17.01
Southern	13.87	15.26	18.28	18.15	21.46	21.68
Louisville & Nashville	12.15	14.76	14.44	15.37	14.86	17.76
Atlantic Coast Line	7.21	6.26	11.15	10.85	6.81	5.32
Seaboard Air Line	15.32	15.21	10.97	10.33	14.22	12.31
Gulf, Mobile & Ohio	10.99	11.42	5.96	6.17	5.54	5.52
Total (6 roads)	11.73	12.52	81.05	81.21	80.44	79.60
Western district						
AT&SF and affiliated companies	12.02	12.24	13.15	13.59	16.89	16.67
Southern Pacific	8.45	8.63	12.32	12.10	11.12	10.46
Union Pacific	6.14	5.44	11.90	11.74	7.80	6.41
CB&Q	11.00	10.73	6.23	6.17	7.32	6.63
Great Northern	9.68	10.27	6.16	5.94	6.40	6.11
CMStP&P	6.13	5.64	5.87	5.76	3.85	3.26
Missouri Pacific	11.91	9.83	5.27	5.28	6.71	5.20
Chicago & North Western	.35	44.38	4.66	4.52	.17	1.99
CRI&P	11.09	13.59	4.62	4.60	5.48	6.27
Northern Pacific	9.01	8.21	4.24	4.01	4.08	3.30
Texas & New Orleans	4.74	8.37	3.15	3.23	1.59	2.71
St. Louis-San Francisco	9.68	11.71	2.85	2.88	2.95	3.38
Texas & Pacific	10.51	14.49	1.92	1.92	2.16	2.78
D&RGW	19.24	15.46	1.81	1.87	3.71	2.91
Missouri-Kansas-Texas Lines	9.87	11.09	1.79	1.89	1.89	2.10
StLSW Lines	15.18	19.08	1.46	1.61	2.37	3.08
Total (16 roads)	9.04	9.54	87.42	87.11	84.49	83.26

9.3% of 1954 Gross Was Carried to Net

Class I line-haul railroads carried 9.3% of their 1954 gross revenues through to net operating income.

This was shown by a compilation in the latest "Monthly Comment" of the Bureau of Transport Economics of the Interstate Commerce Commission. The comparable figure for 1953 was 10.4%.

The compilation also included the accompanying table, which shows for 37 large roads (those with 1954 gross above $50 million) the percentages of 1954 and 1953 gross that were converted into net railway operating income. The range in 1954 was from the Chicago & North Western's 0.35% to the Denver & Rio Grande Western's 19.24%.

The figures also show each road's percentage contribution to the gross revenue and net railway operating income of its territory.

Freight Car Loadings

Loadings of revenue freight for the week ended February 12 totaled 643,859 cars; the summary for that week, compiled by the Car Service Division, A.A.R., follow:

REVENUE FREIGHT CAR LOADINGS
For the week ended Saturday, February 12

District	1955	1954	1953
Eastern	114,484	109,653	123,538
Allegheny	121,980	119,437	142,908
Pocahontas	50,044	45,425	47,403
Southern	123,401	120,476	126,724
Northwestern	70,053	70,760	73,432
Central Western	109,196	103,053	111,581
Southwestern	54,701	54,902	56,018
Total Western Districts	233,950	228,715	241,031
Total All Roads	643,859	623,706	681,604
Commodities:			
Grain and grain products	43,629	44,088	38,590
Livestock	5,958	5,820	6,679
Coal	128,413	109,820	115,202
Coke	10,411	9,458	14,978
Forest products	42,606	40,882	44,212
Ore	14,228	15,747	19,473
Merchandise l.c.l.	62,725	64,466	70,714
Miscellaneous	335,889	333,425	371,756
February 12	643,859	623,706	681,604
February 5	640,735	624,385	690,613
January 29	641,979	628,193	697,442
January 22	635,653	617,213	697,515
January 15	644,940	619,871	705,017
Cumulative total 5 weeks	3,207,166	3,113,368	3,472,191

In Canada.—Carloadings for the seven-day period ended February 7 totaled 66,981 cars, compared with 87,705 cars for the previous ten-day period, according to the Dominion Bureau of Statistics.

	Revenue Cars Loaded	Total Cars Rec'd from Connections
Totals for Canada:		
February 7	66,981	31,608
February 7	69,163	29,989
Cumulative Totals		
February 7	352,649	161,141
February 7	335,389	146,616

1954 Air Travel 25% More Hazardous Than Rail

Travel on regularly-scheduled domestic air lines in 1954 was about 25% more hazardous than travel by rail.

The air lines had their best year, preliminary figures indicating that their 1954 fatality rate was 0.09 passengers killed per 100 million passenger-miles (*Railway Age*, January 3, page 10). The railroads' 1954 rate, also based on preliminary figures, was 0.07. Their best year was 1952, with its rate of 0.04.

Employee Fatalities at New Low—The railroad record was hailed in a statement by William T. Faricy, president of the Association of American Railroads, who went on to say that the preliminary figures also indicated that the employee-fatality rate was at a new low last year—0.08 per million man-hours, compared with 1953's 0.11, the previous low.

Mr. Faricy's comment on the passen-

CHAMPAGNE CHRISTENING on February 8 marked the opening of the Louisville & Nashville's new $750,000 passenger station at Mobile, Ala. (*Railway Age*, February 14, page 15). The day-long civic festivities attracted some 15,000 persons including 6,000 school children, for whom the road displayed a 50-year-old steam locomotive and a modern streamliner. Local radio and television stations broadcast the christening ceremonies. A documentary history of the L&N and its associations with the city of Mobile was broadcast the evening before the dedication.

ger-safety record was that the railroads last year "maintained their position as the safest form of transportation." He also noted that of the 21 passenger fatalities reported by the railroads, only five actually involved passengers in train accidents. The others "resulted from such causes as boarding and alighting or jumping and falling from moving trains," Mr. Faricy added.

"Behind the high standards of railroad safety performance are more than 30 years of organized safety work within the industry and the investment in the same period of more than $20 billion of railroad money in capital improvements," the AAR president also said. "With the replacement of the great bulk of trackage and rolling stock with new, modern facilities, the nation's railroads have become steadily safer as well as more efficient and economical to operate."

The accompanying table is the preliminary summary of railroad accidents for December and last year's 12 months, as issued by the Bureau of Transport Economics and Statistics of the Interstate Commerce Commission. It is subject to revision.

Item	Month of December 1954	Month of December 1953	12 months ended with December 1954	12 months ended with December 1953
Number of train accidents*	658	648	7,495	8,976
Number of accidents resulting in casualties	43	44	467	541
Number of casualties in train, train-service and nontrain accidents:				
Trespassers:				
Killed	59	58	839	971
Injured	88	46	916	957
Passengers on trains:				
(a) In train accidents*				
Killed	..	..	5	21
Injured	6	5	446	684
(b) In train-service accidents				
Killed	3	3	16	22
Injured	147	153	1,733	1,783
Travelers not on trains:				
Killed	1	1	5	7
Injured	97	100	837	855
Employees on duty:				
Killed	21	26	208	306
Injured	1,470	1,523	16,491	19,385
All other nontrespassers:**				
Killed	184	178	1,419	1,603
Injured	621	600	5,088	5,535
Total—All classes of persons:				
Killed	268	266	2,492	2,930
Injured	2,429	2,427	25,511	29,199

* Train accidents (mostly collisions and derailments) are distinguished from train-service accidents by the fact that the former caused damage of $350 or more to railway property. Only a minor part of the total accidents result in casualties to persons, as noted above.

** Casualties to "Other nontrespassers" happen chiefly at highway grade crossings. Total highway grade-crossing casualties for all classes of persons, including both trespassers and nontrespassers, were as follows:

Persons:				
Killed	178	162	1,308	1,494
Injured	460	470	3,435	3,815

Law & Regulation

Illinois Terminal Gets OK To Drop Most Passenger Runs

The Illinois Commerce Commission has authorized the Illinois Terminal to discontinue a majority of its passenger trains. The road had sought to discontinue all passenger services (*Railway Age*, July 5, 1954, page 9) and the Illinois commission's order technically grants the request but provides for experimental continuation of six daily trains. The commission also allowed the road to close its ticket offices in Springfield, Decatur, Champaign, Granite City, Lincoln and East Peoria.

The experimental services will consist of a daily round trip between St. Louis and East Peoria, a daily round trip between Springfield and Champaign and an additional round trip between St. Louis and Springfield. The commission indicated that there were few objectors to the abandonment proposal. Its order becomes effective March 13.

Expense Account Order Won't Be Issued Now

The Interstate Commerce Commission has decided not to issue the order whereby it had proposed to revise accounting regulations as they relate to expense accounts of railroad officers.

The decision came out of an understanding that details to support the expense accounts will be made available to commission examiners. The understanding contemplates further that the examiners "should not be expected to look outside the accounting department for these details, or to resort to any unusual measure to secure them" (*Railway Age*, November 8, 1954, page 8).

People in the News

Boshell and Selig Join FRP Executive Council

Edward O. Boshell, chairman and president of Westinghouse Air Brake Company, and Lester N. Selig, chairman of General American Transportation Corporation, have been appointed to the executive council of the Federation for Railway Progress.

FRP Names C&O Porter Railroad Man of Year

John Edmonds, Chesapeake & Ohio train porter, has been named "Railroad Man of the Year for 1954" by the Federation for Railway Progress. Presentation of the award, which consists of a $100 savings bond and a gold St. Christopher's medal, will take place at a luncheon next month in Washington's Sheraton-Carlton Hotel.

A resident of North Kenova, Ohio, Mr. Edmonds is employed on the C&O's Huntington division. He has been with the road for 25 years, and he is a member of the Brotherhood of Train and Sleeping Car Porters.

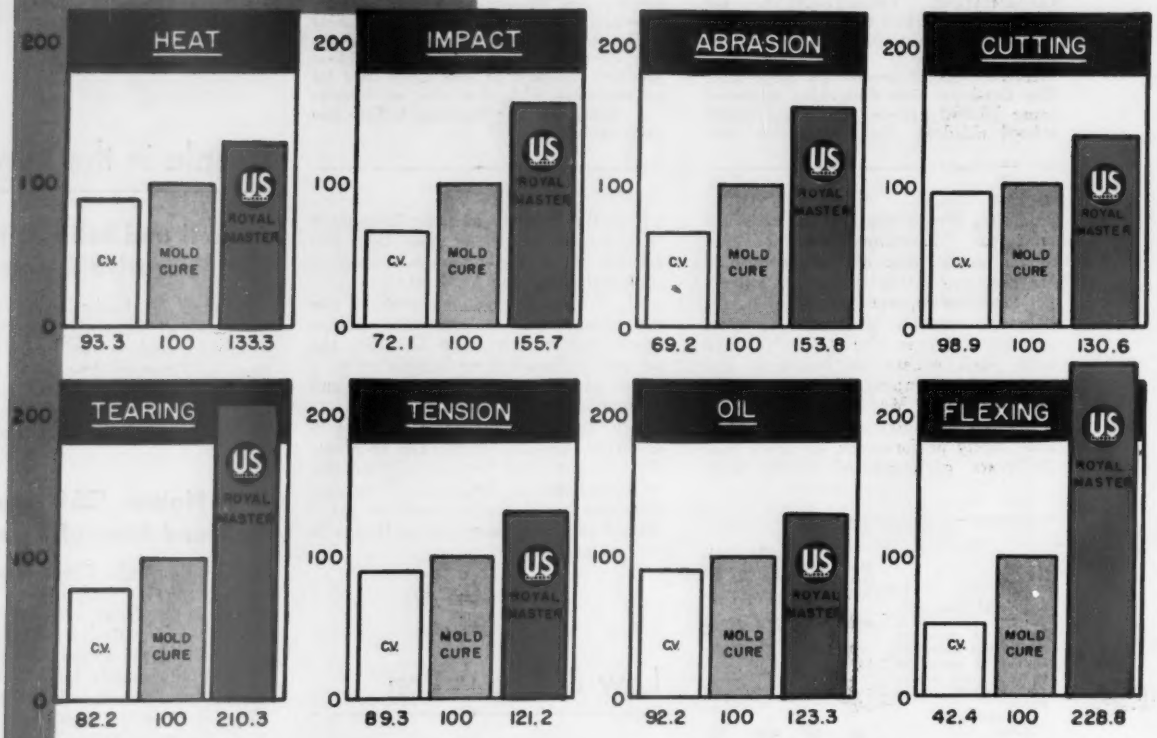
He first won an FRP monthly courtesy award for which he was nominated by R. F. Duffield of Charleston, W. Va., who called him "the best porter I have ever seen." The "Railroad Man of the Year" is chosen from among these monthly winners, and Mr. Edmonds is the second porter to be selected.

Winners Named in N. Y. Railroad Club Essay Contest

At a meeting of the New York Railroad Club at the Hotel Commodore, New York, February 24, the club's president, A. E. Kriesien (assistant vice-president and general manager of the Erie), presented the prizes to

(Continued on page 14)

New U.S. ROYAL outperforms,



Comparative performance of portable cords related to major life factors.

Graphs illustrate the outstanding superiority of new U. S. Royal Master Cord—over the average of molded cords and the average of short-lived continuous vulcanized cords of other makes—on every major life factor. (Average of other molded cords is rated at 100%.)

US RUBBER

UNITED STATES

ELECTRICAL WIRE AND CABLE DEPARTMENT

MASTER portable cord *outlasts all others!*

Comparative tests show U. S. Royal Master gives $1.88 in value for every $1.00 spent — almost *twice* the service value of the average of other molded cords!

LOOK FOR THE NAME — U. S. ROYAL MASTER

Two years ago, "U. S." engineers began a *complete reexamination* of portable cord construction, service life, and the causes of cord failure.

Over 10,000 tests were made. More than a thousand cords of all leading makes, including our own famous U. S. Royal Cord, were analyzed, tested, and compared.

Every life factor was considered and carefully evaluated, alone and in its relation to overall cord performance and service life.

Backed by 64 years of experience in the manufacture of electrical wire and cable, U. S. Rubber engineers then translated their findings into an entirely new portable cord, designed to surpass any other previously made.

Extensive tests, both in the laboratory and in outside plant installations have proved this new portable cord startlingly superior in every respect!

New U. S. Royal Master is unquestionably the finest cord you can buy!

From every standpoint, as the charts at left illustrate, new U. S. Royal Master is a finer, more durable cord—actually gives 88% longer life than the average of competitive molded cords—far longer than *any* other cord—surpassing even a hypothetical cord incorporating the best features of all those tested!

Far greater value, too! In spite of almost doubled service life, this great new cord is in the same price category as other molded cords—giving you $1.88 in cord value for every cord $1.00!

Prove to yourself the outstanding superiority of new U. S. Royal Master Portable Cord—in both service life *and* economy! Write address below for FREE descriptive booklet illustrating the superiority of the U. S. Royal Master Cord. And get in touch with your "U. S." distributor today.

Approved by Underwriters' Laboratories, Inc.

RUBBER COMPANY

ROCKEFELLER CENTER, NEW YORK 20, N. Y.

People in the News

(Continued from page 11)
winning contestants in the 1954 New York Railroad Club Essay Contest. The three winners were:

First Prize ($750): Wayne J. Kangas, commercial agent of the Erie, New York, for his paper entitled, "Maximizing the Railroads' Net Earnings Through Their Inherent Advantages."

Second Prize ($500): Carl V. Lyon, car service agent, Car Service Division, Association of American Railroads, Washington, D.C., for his paper entitled, "The Inherent Advantages of Railroads and How They Can Best Be Protected."

Third Prize ($250): Stuart W. Rider, Jr., assistant solicitor of the Milwaukee, Minneapolis, Minn., for his paper entitled, "Increased Earnings Through Human Relations."

Both Mr. Lyon and Mr. Rider are second-time New York Railroad Club Essay Contest winners—Mr. Lyon having been a winner in 1952 and Mr. Rider in 1951.

The judges in the 1954 contest were J. L. Cranwell, vice-president—New York, of the Pennsylvania; H. W. Dorigan, vice-president, traffic, of the Central of New Jersey; and F. K. Mitchell, assistant vice-president management services, of the New York Central. The essay contest has been held by the club each year for the past six years—with prizes given for the papers judged most constructive in the direction of improved performance and service by the railroads. The club has awarded a total of $9,100 in prizes to 44 winners of the 6 contests held since 1949.

Public Relations

"Let's End Subsidy Barbs"

The public isn't impressed, says Warren Brown—Railroads must become positive in their approach if 1955 is to be "a year of decision," he tells public relations group

"This is the time to burn our cry-our competitive abilities," Warren W. ing towel. We should cease our at-Brown, president of the Monon, said tacks upon other modes of transport recently in Cincinnati.
We should concentrate on improving His comments were addressed to the Railroad Community Committee of Greater Cincinnati—one of the more recently formed units in the Eastern Railroad Presidents Conference program to improve the railroad industry's public relations at the "grass roots" level.

Stating that railroads must "discard forever the negation of the past," Mr. Brown made these specific suggestions for future public relations policy:

Subsidy—"Let us detach ourselves in the matter of subsidy for competing transportation. The railways, the air lines and the trucks have never proved or disproved conclusively in the eyes of the public the fact that subsidies exist of any sizable proportions. The public is not impressed by the attacks and frankly wonders if the sporadic slaps at the theory of subsidy might be effort more worthwhile if directed elsewhere."

Mail Diversions — "If the Post Office Department can get cheaper rates by truck or air than by rail without adding excessive terminal handling costs, certainly the American taxpayer will wish the postal authorities to do so. The argument that expensive rail terminal facilities must be taken into consideration is looked on by the public to be somewhat fallacious. The purchase of any type of equipment or the construction of any type of facility to handle a particular type of traffic are ventures which industrialists look upon as daily business gambles.

"I believe that as far as the public is concerned, the use of airlines to carry first class mail and the utilization of trucks to handle storage mail

TO MARK THE 50TH ANNIVERSARY of the first Union Pacific line in the Los Angeles area, the railroad borrowed this antique passenger train from RKO Pictures Corporation for a "golden spike" re-enactment. About 100 costumed members of the Railway & Locomotive Historical Society watched A. D. Hanson, UP general manager, and K. V. Hackman, a director of the society, drive the spike "linking" the San Pedro, Los Angeles & Salt Lake with the UP. A "holdup" by old-time desperados was foiled—but the UP, fully dieselized in the area, had to summon a Long Beach fire department pumper to keep No. 25 in water.

WEST GERMAN AND DUTCH transportation executives reviewed Railway Express Agency operations in New York City early this month. From left to right are Dirk Van Setten, The Netherlands; Richard Gebauer, Germany; Horst Heffele, Germany; Hans Koldewey (guide and interpreter), New York; Gerhard Heinze, Germany; Hans Joachim Kuhnert, Germany; and Pieter Drajer, The Netherlands.

is done because the postal authorities think they can show a saving in overall cost. We must meet the competition on that basis.

"Eliminate from your conversation," he told the committeemen, "any mention of the fact that railroads should continue to receive the mail because passenger services, needed in time of defense, will dry up. If the postal authorities are capable of demonstrating cost savings to the American public by the use of other transport, are we not, in the eyes of the public, asking for outright subsidy when we petition postal authorities to ignore those savings and pay more for a service than they think they should?

Labor Relations—"The elements of adequate wages, property improvements and stockholder returns must be in balance, and the assignment is not a prerogative for any group alone to determine. On our railroad we expect to invite the railroad's general chairmen to our staff meetings," he said.

Mr. Brown also urged support of the Interstate Commerce Commission's plea for funds adequate to meet the work load demanded of it. He called for initial frankness in dealing with industrial traffic managers and their rate proposals. He termed it a "major irritant" to them to have railroad rate committees infer acceptance of a proposal yet "rudely shock" the traffic men later by defeating it.

NP's Program Cited

For its 1954 public relations program, the Northern Pacific has been presented with the annual award of the Advertising Club of St. Paul. The club selected the NP primarily because of its promotion of the resources and development opportunities of Northwestern states. Also cited was the road's promotion of its $7½-million passenger service improvement program and inauguration of the vista-domed "North Coast Limited."

Robert S. Macfarlane, NP president, received the award at a dinner meeting commemorating National Advertising Week. Ben Duffy, president of the advertising firm of Batten, Barton, Durstine & Osborn, Inc., was the principal speaker.

Competitive Transport

NARUC Body Opposes Mail, Troop Diversions

The executive committee of the National Association of Railroad and Utilities Commissioners has passed a resolution opposing government diversion of mail and military personnel from the railroads to other modes of transportation.

Calling attention to the "increasingly serious problem" of the railroad passenger deficit and the "indispensable" role the railroads must play in wartime, the committee called for legislation to be introduced in Congress opposing such diversion.

The committee singled out the Post Office Department for taking mail traffic from the railroads and giving it to the trucks and airlines and criticized the Department of Defense for using non-military planes in troop movements rather than the railroads. Such practices, the committee resolution declared, "have contributed substantially to the said passenger deficit, and such contribution thereto is becoming increasingly more serious in its effect." The NARUC body called the policies unsound and uneconomical and authorized its Special Committee on Cooperation with the Interstate Commerce Commission in the Study of the Railroad Passenger Deficit Problem and the chairman of the committee on legislation to draft legislation implementing the resolution.

10-Year Highway Program Is Forwarded to Congress

President Eisenhower has forwarded to Congress—for its "use"—the report of his Advisory Committee on a National Highway Program calling for a 10-year expenditure of $101 billion for highway construction.

In an accompanying message the President said the report and one by the Bureau of Public Roads comprise a "solid foundation for a sound program" but failed to make any specific endorsements. As reported in *Railway Age*, January 17, page 9, the President's committee (known as the Clay Committee after its chairman, Lucius D. Clay) proposed federal participation amounting to one-third of the total $101 billion expenditure. Of this, $25 billion would be spent on improvement of the 37,600 miles of roads designated in the National System of Interstate Highways.

The program would be financed through bonds to be issued by a Federal Highway Construction Corporation. As to servicing the bonds, the President had this to say: "Financing . . . . should be based on the planned use of increasing revenues from present gas and diesel oil taxes, augmented in limited instances with tolls. I am inclined to the view that it is sounder to finance this program by special bond issues, to be paid off by the above-mentioned revenues which will be collected during the useful life of the roads and pledged to this purpose rather than by an increase in general revenue obligations."

He stressed a note of urgency, stating that "a national highway pattern" must be developed to solve the highway problems. He said that the present "network is inadequate for the nation's growing needs" and cited four special areas of concern.

These include, the President said, annual traffic fatalities which he attributed partly to unsafe roads; vehicle operation over inferior roads resulting in extra transportation costs which "pyramid" as they are handed on to consumers; the threat of atomic attack in which present highways, used for evacuation of target areas, would cause "deadly congestion;" and, finally, traffic congestion which today only "faintly foreshadows" conditions in 1965 unless highway improvements are made to match expected business and population rises.

The President said he feels "it is an obligation of government at every level" to correct these conditions, noting that "the highway system is a public enterprise."

The Clay report advocated continu-

ing federal participation in highway construction, other than in the interstate network, at approximately current levels. This would mean 10-year totals of $5.25 billion for primary and secondary roads, $750 million for urban systems, and $225 million for forest highways.

Organizations

The 11th annual meeting of the **"No-Work-No-Worry Club,"** an organization of retired railroad and industrial traffic executives, will be held at the Grey Gull Inn, Clearwater, Fla., March 10, with luncheon at 12:30 p.m.

The 48th annual dinner of the **Traffic Club of Washington, D.C.,** was held at the Statler Hotel in that city February 9. The speaker was John F. Davis, former mayor of Reading, Pa. Presiding was the club's president, Walter W. Coe, while Robert Huey was toastmaster. Both are on the transportation staff of the U.S. Marine Corps. The dinner committee's chairman was E. Ralph Cross, district freight agent, Baltimore & Ohio.

The 96th regular meeting of the **Pacific Coast Shippers Advisory Board** will be held at the Hotel Sir Francis Drake, San Francisco, March 10-11. P. W. Johnston, president of the Erie, will speak on "The New Responsibilities of Railroad Management" at a luncheon on the 11th.

The **Ohio Valley Transportation Advisory Board** will hold its 113th regular meeting at Columbus, Ohio, on March 9.

The 72nd regular meeting of the **Allegheny Regional Advisory Board** will be held at the Hotel William Penn, Pittsburgh, March 16-17. Chairman Richard F. Mitchell, of the Interstate Commerce Commission, will speak at a luncheon on the 17th.

James L. Barngrove, Jr., general traffic manager of the Lackawanna, will speak on "Piggyback—Trailer on Rail Flatcar," at the annual Railroad Night of the **Wyoming Valley Traffic Club,** in the Hotel Jermyn, Scranton, Pa., March 2.

Equipment & Supplies

Symes Describes New PRR Lightweight Train

The Pennsylvania's Board of Directors has "authorized construction" of a "completely new type of passenger train," incorporating a "wholly new coach design, combining 'close-to-the-rail' glider riding qualities with full-strength tubular construction," PRR President James M. Symes announced February 24.

The basic design of the train, which Mr. Symes says will have "the lowest center of gravity of any train yet engineered," was forecast in a recent outline of plans of several roads to put new lightweight trains on the rails (*Railway Age*, February 21, page 8).

Consisting of seven coaches and a power car for air conditioning, heating and lighting, the new PRR train will accommodate nearly 600 passengers. It will be used at first in "moderate distance" service between major cities on schedules "materially faster than would be comfortable on conventional trains," Mr. Symes declared. It will cost approximately $1,000,000. Initially, existing diesel-electric or electric locomotives will be used, depending on the service to which the train is assigned.

"With probable quantity production of this type of train in the future, resultant lower construction costs and the lower operating and maintenance costs which are assured, I believe we can look toward a substantial reduction in the cost of providing railroad passenger service," Mr. Symes said.

"The new cars will differ radically from conventional railroad equipment, in that the floor, sidewalls and roof will constitute a car-length tube of great strength. This eliminates the need for a heavy steel 'center sill', and provides a lower, less weighty body structure."

He said another advantage of the design is that, with the elimination of the center sill, the car floor can be depressed in the center section between the wheels, opening the way to an "interesting two-level floor arrangement, providing a center of gravity almost a third lower than in conventional cars."

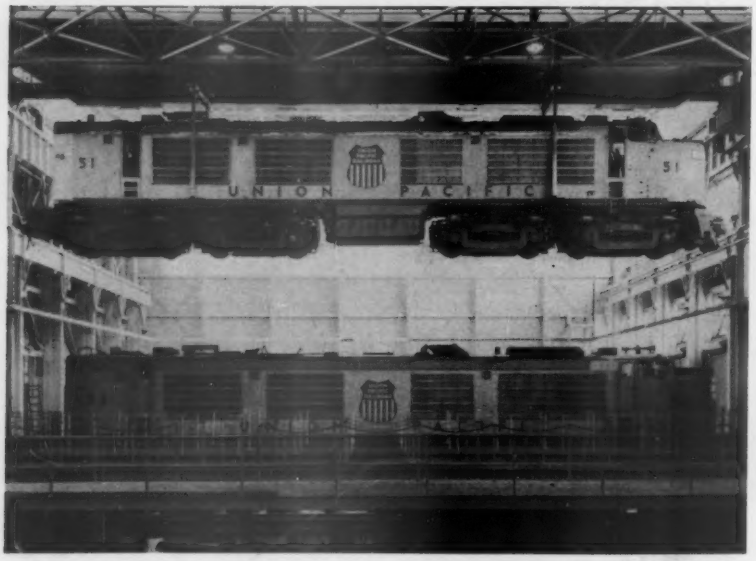
"The center of gravity of the cars determines the speed at which trains may round curves without discomfort to passengers," Mr. Symes explained. "Low centers of gravity are inherent in diesel and electric locomotives, so that by reducing that factor in the cars we can materially quicken train speeds on curves with full safety and comfort for the passengers. Important reductions in running time will result."

The new cars will be 21 inches lower over-all than existing coaches, will weigh only 60% as much, and will ride on a four-wheel truck under each end. The reduction in weight permits use of smaller wheels, contributing to less car height. Each car will be 85 feet long, and will accommodate 84 passengers in reclining seats. Lavatory facilities will be provided in each car, as well as space for hand baggage.

The two-level floor design with seats on the higher level for 12 passengers at each end and for 60 passengers on the lower level, will provide entrance vestibules designed for boarding and alighting at either track-level or regular station platforms.

"This new train was developed by the Mechanical Research Committee set up by six railroads, including the Pennsylvania, to plan passenger trains of entirely new types completely adapted to modern transport needs," Mr. Symes said. "The tubular design and the other developments which characterize this approach to rail travel are among the results of the committee's six months' study of all present and proposed concepts for modern passenger equipment in this country and abroad."

(Continued on page 35)



"FIRST FLIGHT" for a Union Pacific gas turbine locomotive. The 551,000-lb freight unit served to test the UP's 270-ton Whiting crane, newly installed in the Salt Lake City shops. A companion unit remains on shop rails below.

Letters from Readers

In Place of "Piggyback"

WASHINGTON, D.C.

TO THE EDITOR:

As far as I can determine, there are only four railroads, of the 23 with established "piggyback" service, that have singularly identifying names, viz.: PRR — TRUCTRAIN, B&O—Tofcee, NH—Trailiner, and now the Monon with Trailer-Maid.

After reading about Monon President Brown's award to an employee for suggesting that road's name for its piggyback operation, I spent some time

trying combinations of letters and words, and came up with the idea represented in the accompanying sketch.

The device seems to tell the story of prompt and fast movement by rail and trailer, the capitalization prominently tying the name to the railroad industry.

J. F. REILLY
Assistant to Vice-Chairman
Car Service Division, AAR

●

Ask for Traffic Man

WASHINGTON, D.C.

TO THE EDITOR:

Hurrah for your editorial (December 20, 1954) on rate-making policy (raising the question whether traditional differentials can be maintained)!

The whole problem reminds me of Prohibition; a basic law was on the books but everybody ignored it. Nobody can repeal the basic laws of economics but apparently everybody can ignore them.

The ICC can argue legalistically but the fact is that every rate that is fixed represents a price to a customer who has the right to decide how much he will buy. Thus, the commission is dividing up the transportation market constantly by its decisions on specific truck and rail or water and rail rates. And when it sets a rate for two different hauls by a single carrier it is dividing up the markets of competing shippers—whether the commission says it or not, the establishment of a relative price for two shippers affects the ability of each to serve a given customer.

I certainly agree that managements must understand this fundamental principle before trying to convince anyone else. A basic step in this direction would be a campaign to separate the principles from the legalisms.

I say this because I think the traffic men and the lawyers have had so many problems for so many years in dealing with the commission and the law that they are tired and discouraged. Perhaps they identify past history too much with future prospects. In any event, there are many cases, many decisions, much legislative history, and so on, which bedevil the traffic man. He has had to work within the confines of certain legalisms for so long that he accepts them as principles when they may be merely anachronistic interpretations.

The first step is to ask the traffic man what he would do "if he were king"—strictly as a matter of policy and principle, without regard to any legal interpretations. When the traffic man has told the president what he would like to do rather than what he cannot do, I think the atmosphere will improve. If you can get the traffic man to state the objective, you may then get the president to say "Let's go to it."

WILLIAM B. SAUNDERS,
Transportation Consultant

●

Doubts Value of "Time Lag" Bill Now

ALBUQUERQUE, N.M.

TO THE EDITOR:

I am inclined to doubt it is wise policy for railway spokesmen to seek a "time lag" bill *and* the right to make far-reaching competitive reductions in freight rates, at the same time.

The matter of timing of the particular regulatory or legislative objective is of the highest importance. During the present mildly deflationary phase it might be wise to concentrate upon reducing rates where truck or water competition makes this desirable. A period of rising prices would be more propitious, it seems to me, for pushing a time lag bill.

There is still another possible drawback, as the writer sees it, to pushing the time lag bill, now. If it be assumed, as I do, that new legislation is not needed to make it possible for the railroads to lower their rates to meet truck competition, then the wisdom of presently saying, in effect, to the ICC, "You are too slow about permitting rate level increases," is doubtful. For this reasoning would tend to make the ICC conclude that new legislation for competitive pricing would also be needed. Consideration should therefore be given to the tabling, at least for the time being, of the time lag bill, because, it appears to me, differential pricing to meet competition of the other media is presently more important for the preservation of the inherent advantages of railway service.

It would seem, as J. W. Barriger suggests, that the railroads should publicly declare that, in the future, when reducing rates to meet competition, such rates will not be increased without commission consent—in the event a rival withdraws or increases its charges by reason of the railroad action.* This would increase the chances of ICC (or legislative, if this proves necessary) approval of such reductions, and it would take away one of the most telling arguments of those who would deny such permission. Over and over, one hears the assertion that the reductions are or would be made only to remove a rival and after the rival has been eliminated the railroad will immediately go back to its former price.

JULIAN S. DUNCAN
Department of Economics
University of New Mexico

●

Base Rates on Car-Mile Costs *Plus*

HINSDALE, ILL.

TO THE EDITOR:

Toward revision of the making of freight rates, why not start with basic cost per average car-load-mile and haul, and then modify that figure in order to arrive at the rate for an individual shipment.

Modification of the basic cost would add or subtract for:

(*Continued on page* 20)

*J. W. Barriger, vice-president of the Rock Island, is the author of an essay entitled "Let's Fold Up the Umbrella." This is one of ten articles appearing in "Essays on 'Inherent Advantages' of Railway Service," published by Simmons-Boardman Publishing Corporation.

Copies Needed

January 1955 Issue
Railway Freight Traffic

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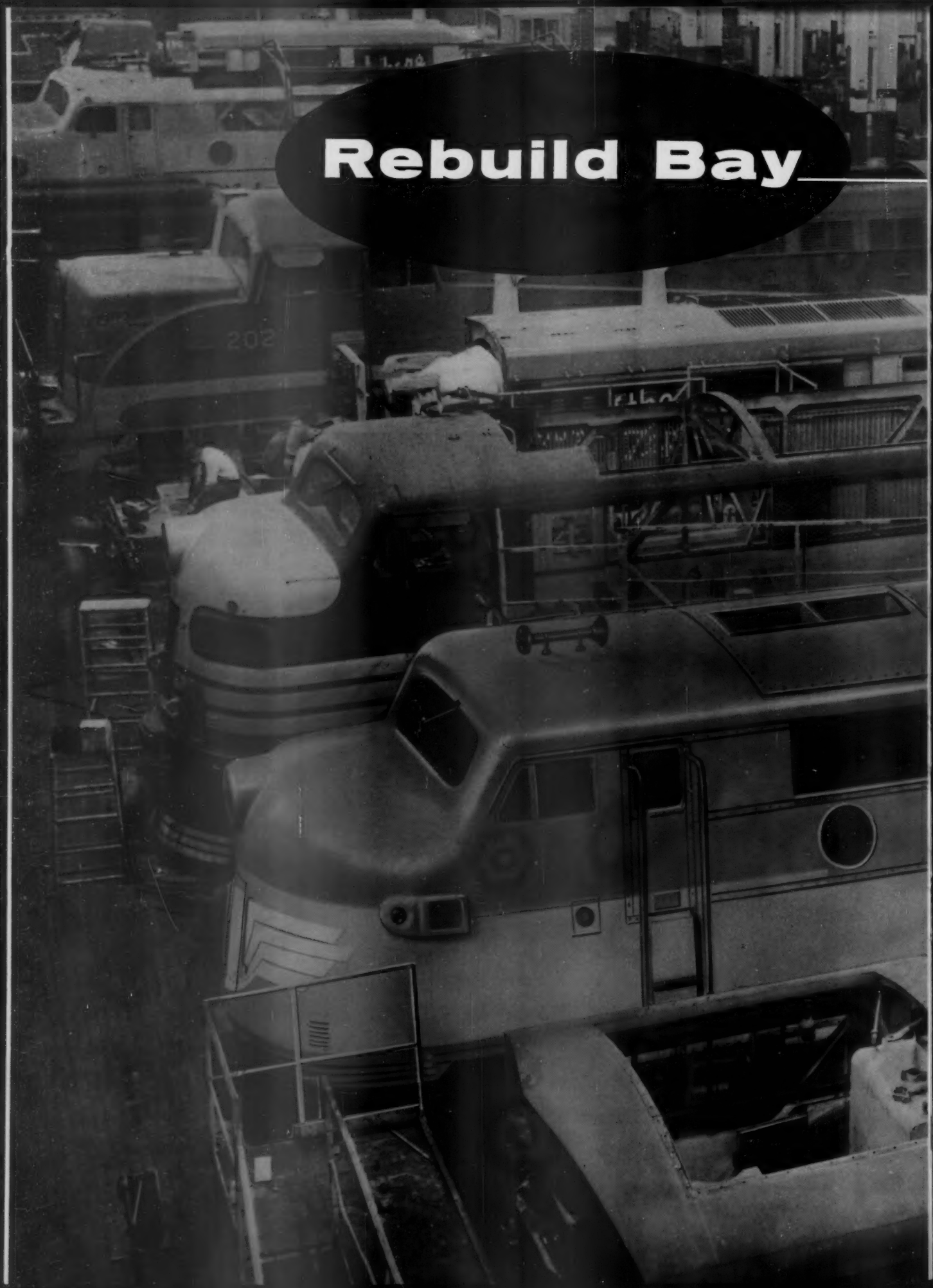
Rebuild Bay

"But where are the pieces?"

A railroad man inspecting our so-called Rebuild Bay at La Grange recently expressed surprise that he didn't see any Diesel engines, generators or motors scattered around the floor.

It's easy to explain. This 40,000-foot bay is simply the place where locomotives are dismantled and the car-bodies worked on — while all other major components are *remanufactured* on regular production lines throughout our factory.

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Your Electro-Motive representative will gladly explain the savings it can bring your railroad—savings that can often be used to improve other phases of operation.

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La Grange, Illinois—Home of the Diesel Locomotive
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Sure-footed Tournatractor safely crosses trestles and high bridges. Ability to drive along the track is an important advantage . . . sometimes is the only way to reach a job.

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Do your scattered earthmoving jobs faster and cheaper with one man and a rubber-tired Tournatractor!

No need to get a work train ready. No time-consuming loading and unloading of equipment. No waiting for dispatchers and a clear track.

Instant-acting 4-wheel air brakes give Tournatractor operator ample margin of safety for working at edge of steep banks. Braking surface totals 2822 sq. in.—4 times as much as on most vehicles. Low-pressure tires do no damage to ties, rails or switches.

Operator just hops on and goes—over tracks, pavements, bridges, along right-of-way, or highway. Averages a mile every 3 or 4 minutes.

Once on a job, Tournatractor gets right to work. When dozing, it delivers 2½ yds. every few seconds. It also pulls equipment speedily, uproots trees, brush, cuts slopes, etc. Because of its greater speeds, it will outwork the biggest crawler-tractor on almost every assignment. It has 4-wheel drive, instant gear change with constant-mesh transmission, torque converter, powerful 4-wheel disc-type air brakes, and fast fingertip electric control. It's easy to operate, handy to maneuver, safe and dependable, needs little maintenance. It gets work done fast without delays to rail traffic. And it goes from job to job in a hurry!

For fast, economical right-of-way maintenance on your railroad, check further the rubber-tired advantages of Tournatractor. It's a dependable job-proved product of the earthmoving subsidiary of Westinghouse Air Brake Company.

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LeTourneau-Westinghouse Company

PEORIA, ILLINOIS

A Subsidiary of Westinghouse Air Brake Company

Letters from Readers

(*Continued from page* 17)

(1) weight per carload, over or under the basic,

(2) handling cost, if any,

(3) underloading, and

(4) economic considerations like volume and continuity of shipments, length of haul, or empty movement.

Those four items deal with cost only. After the net total cost of shipment is known, add a percentage representing a reasonable profit to the carrier.

Exceptions to this form of classification would only be the occasional, outsized freight, and truck trailers until such time as trailer rating could be made to conform with such general rating procedure.

The basic cost would be figured for each classification territory separately, and it would absorb the terminal costs.

Distinctions would be clear as between cost, profit, and price.

H. G. DUGAN

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How to Find Out Where Waste Is Going On

SILVER SPRINGS, MD.

TO THE EDITOR:

If railroads are to be operated at maximum efficiency, there needs to be some yardstick to provide a frequent check—as a matter of routine—on every item of railroad expense. The method of index numbers outlined in my November 1, 1954, *Railway Age* article (page 42) is one means of accomplishing this objective. A high index number does not prove that something is wrong—but it does disclose a situation that needs inquiry. There are too many costly situations which never come to light—or do so only after thousands of dollars have been wasted.

The mechanical department of one large railroad learned, more or less by accident, that it was spending twice as much to clean triple valves at one of its big shops as the job was costing at another shop. Investigation led to the correction of this condition, but it also disclosed the fact that the wasteful practices at the first shop had been going on for ten years. Matters of such importance ought not be left to chance.

A retired mechanical officer used to visit my office some fifteen years or more ago. He was a close student of operating statistics. He kept up-to-date on these figures, and made the rounds of mechanical officers he knew, using these figures as a basis for discussion with them of their current performance. He got the word around as to who was doing what at the lowest cost—under the theory that there was nothing quite so effective in bringing about effective performance as to get the performers engaged in a "hoss race."

W. R MCLEAN

Traffic Executive Probes "Traditional Differentials"

There is nothing indefinite or academic about the subject of the second Warren Brown-*Railway Age* essay contest, on "Traditional Differentials"—announced in our January 17 issue, page 15:

"Traditional Differentials in Railway Rates—Should They and Can They Be Maintained Under Rivalry from Contract and Private Transportation?"

Railroaders may go after Mr. Brown's first prize of $500, and this paper's second prize of $250, with assurance that the subject of the contest is one of the most timely and down-to-earth topics in the business today. However complex the term "traditional differentials" may seem at first glance, we have suspected for a long time that continuance of this idea in the regulation of rate-making is a prime reason why railroads are finding it progressively more difficult to compete.

Confirmation of this suspicion now comes from a high-placed, practical railroad officer. L. R. Capron, vice-president—traffic of the Burlington lines, told the Denver chapter of the transportation fraternity, Delta Nu Alpha, last month that one of his "own pet gripes" is what he terms *"impotent* freight rate relationship orders"—which continue to play a big part in the Interstate Commerce Commission's control over rates. Mr. Capron terms them "impotent" because "few, if any, outstanding relationship orders by which railroads are bound afford the protection to the shipping public they were designed to give." The orders are "impotent" in serving the public interest because they do not control the actions of non-rail carriers outside their orbit. To carry Mr. Capron's characterization further: Most relationships imposed by the commission on railroad rates make the railroads impotent—and their rivals potent.

The Burlington traffic executive has no quarrel with the past. "For decade upon decade the commission labored to bring about non-discriminatory adjustments of class rates and of rates on practically all major commodities. Volumes upon volumes of ICC reports testify to the scope of the efforts and accomplishments of that august body in the direction cited. Truly the commission did much to bring order out of chaos. . . . "

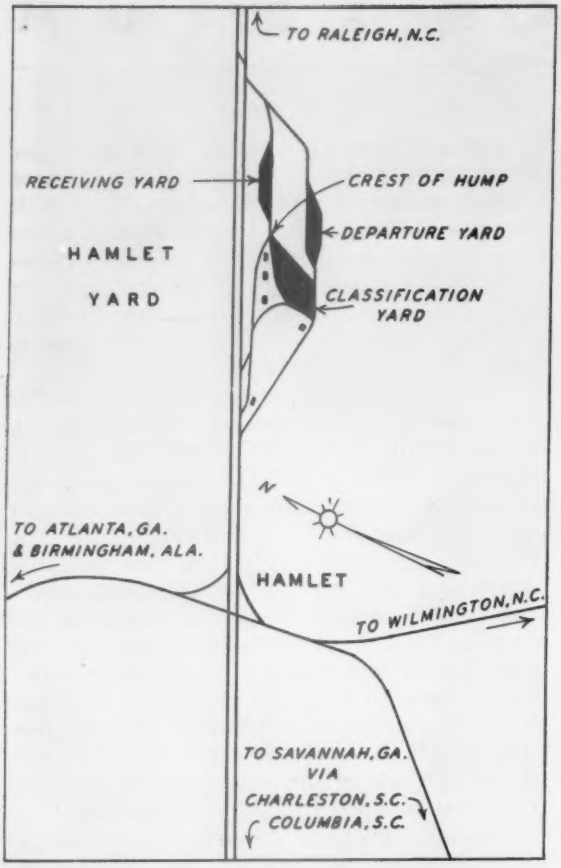
But now history is repeating itself. The commission was not able to bring about a system of delicately balanced rates until the country was well covered with large railroad systems. Now its labors are performed in the face of thousands upon thousands of small truck lines and contract truckers—whose operations prevent the commission from maintaining equitable relationships with any hope of practical effectiveness.

Mr. Capron produced examples to prove his point. One concerned rates on new automobiles. As a part of its decision (279 ICC 377), the ICC required railroads to maintain a fixed percentage relationship between autos shipped from assembly plants and those from manufacturing plants. The effect was to require a reduction from the latter each time a rate from the former was lowered—even though parallel competitive situations did not exist. Thus, the railroads were obliged to retire from shorter haul business, or to make drastic cuts in rates on long-haul traffic—cuts not warranted by competition. Comments Mr. Capron: "The long-haul shipper is not benefited by failure of railroads to participate in the short-haul traffic that is exposed to truck competition."

Another example concerned movement of certain iron and steel products from Sterling, Ill., to the Twin Cities. Competition of contract truckers forced the railroads to reduce their rates. However, outstanding orders of the ICC provided that the roads could not meet this competition without making a corresponding reduction from Sterling to points in the Midwest generally. Worse, an associated order required that any reductions out of Sterling also be made out of two producing centers located, many miles distant, in Indiana. The railroads concluded that a "round-robin" of rate adjustments, to meet competition between two points only, was unwarranted. They sought relief from the order. Their application was denied. The result of the ICC's denial is best told in Commisioner Mitchell's dissent to the majority's decision.

"The only thing that the finding of the commission in this case will do is to continue to have these steel products move by unregulated trucks. It will deny to the railroads the right to compete with this unregulated private carriage! None of the opponents will gain by this report because the traffic will still move at the lower truck rates."

The railroads' request for a rehearing of the Sterling case was denied. Nevertheless, says Mr. Capron the railroads will exhaust every effort to show that the commission's outstanding order is "impotent" because it cannot control the trucks.



WHY YARD WAS BUILT AT HAMLET

Five lines of the Seaboard radiate from Hamlet: (1) North to Richmond, Va., (2) south via Columbia, S. C., to Florida; (3) south via Charleston to Florida; (4) east to Wilmington, N. C.; and (5) west to Atlanta, Ga., and Birmingham, Ala.

Previously, the road's classification work was done at major terminals such as Richmond, Raleigh, N. C., Portsmouth, Va., Charlotte, Atlanta, Birmingham, Savannah, Ga., and Baldwin, Fla., as well as at Hamlet. Now these other terminals merely block cars for Hamlet or beyond. The new Hamlet yard makes a total of 58 classifications, a much more complete performance than before. As a result of the cumulative savings in yard time, the overall time en route for through traffic has been reduced by hours.

HOW THE SEABOARD'S . . .

New Yard at Hamlet

- Improves freight service
- Reduces operating expenses
- Minimizes switching at other yards

Freight-train service on the Seaboard Air Lines has been materially expedited because trains are now being handled on a production-line basis in the recently completed modern gravity classification yard at Hamlet, N. C.

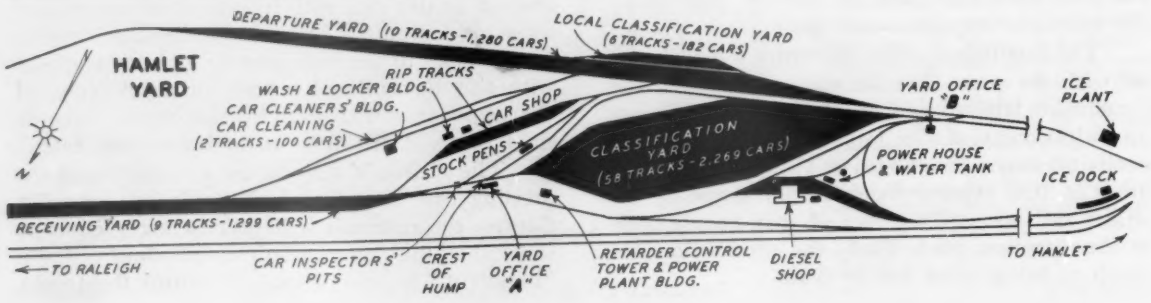
This new $7½ million, 600-acre facility, with a total capacity of 5,030 cars, has a 9-track receiving yard, a 58-track retarder classification yard, and a 10-track departure yard. Nineteen through freight trains, averaging 125 cars, are classified daily in this yard.

Additional facilities at the yard include a new diesel shop for running repairs and general maintenance; locomotive servicing facilities; car shops for light and heavy repairs; ice dock with mechanical icing machine; freight-car cleaning facilities; power plant with standby diesel engine generator for electric power; and complete floodlighting.

Major Icing Point

Perishables moved on the SAL are mainly vegetables and citrus fruit from Florida, and peaches and apples from Georgia and the Carolinas. Hamlet is one of the major icing centers on the railroad. An ice plant, conveyor and ice dock were already in service at Hamlet, but icing was done by hand. As part of the new yard facilities, a new ice dock (2,250 ft long) was constructed, and a Preco mechanical ice machine was installed which can ice a car in 45 sec. The tracks on either side of the dock each hold 50 cars.

When perishable trains arrive, a Recordak machine is used to photograph the waybills of the cars, and the microfilm is sent to the yard office where the film is developed, and pertinent information taken off by the use of a "viewer."



How the Yard Operates

Operations of the new yard are under the direction of the general yardmaster (Yardmaster A), whose fourth-story office is in Yard Office A at the crest of the hump. He has immediate jurisdiction over receiving yard operations and the classification of cars. Assisting him is a yardmaster at Yard Office B at the south end of the classification yard.* The yardmaster here directs the build up of trains in the departure yard, which includes pulling cars from the classification yard.

When an approaching freight train is within four or five miles of Hamlet, the dispatcher at Raleigh telephones Yardmaster A informing him of the train's position. Trains from the south, west and east (i.e., from Savannah, Birmingham and Wilmington, respectively) actuate an approach circuit about 4,000 ft from the yard office which lights an indication lamp and rings a bell on the car checker's desk in Yard Office A. Yardmaster A will press a button which "codes out" a number to be displayed on the yard track indicator (digit type), by which the crew is advised what track the train is to take. The train enters the yard through a remote control interlocking (dispatcher controlled), and goes down a pull-in track. If the train is northbound, it will pass Yard Office A. As it does, a yard clerk watching from a window will call off car numbers and initials into a Soundscriber microphone, recording the train consist.

If the train enters the north end of the yard, it will pass a checker's building where a clerk reads the car initials and numbers into a handset which, over a telephone pair, operates a Soundscriber. The recorded consist list is transcribed, from which a switch list is prepared and sent via pneumatic tube to the yardmasters at Yard Offices A and B, the hump conductor, the retarder control operator, the scale clerk, and record clerk.

After the train pulls in on a receiving yard track, the road engine is cut off, and the hump engine (two 1,200-hp locomotives coupled) takes over. The hump engines are equipped with radio and cab signals. By this time the switch lists have been distributed, and the hump

*Although the yard lies in an east-west direction, timetable directions are north-south. In this discussion the yard will be treated as a north-south yard.

WHAT MAKES THE NEW YARD MODERN

- **An automatic electronic scale;**
- **Automatic switching;**
- **Automatic retardation on the master and intermediate retarders;**
- **Car-rollability on the retarder control machine;**
- **"Trackfullness" indication for each classification track;**
- **Remote control interlockings at yard entrances;**
- **"Stop-shove" signals in the departure yard;**
- **Cab signals on hump engines;**
- **Yard radio;**
- **Yard communications including talk-back and paging systems, telephones, "intercoms" and pneumatic tubes; and**
- **Car checking with recorders by telephone.**

Receiving—

YARDMASTER upon being informed by radio or telephone of train's approach to yard will code out a number to . . .

. . . YARD TRACK INDICATOR which shows number of track upon which train is to occupy in receiving yard.

CAR CHECKER records car initials and numbers of inbound northward trains as they pass Yard Office A.

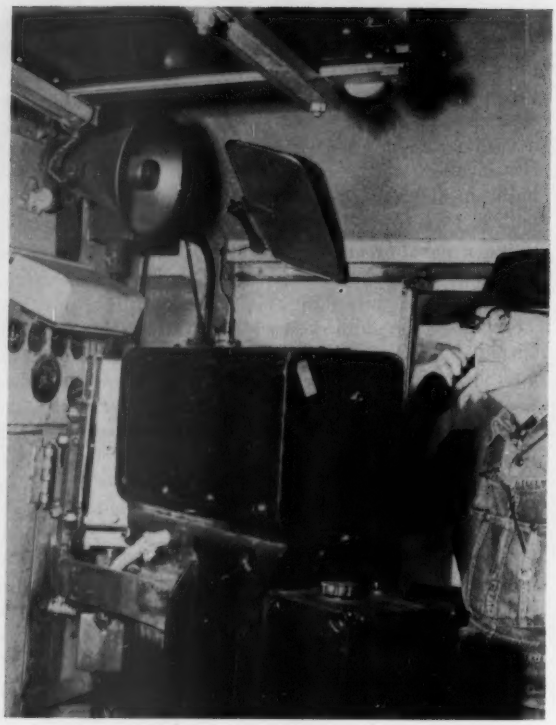
conductor (in a ground-floor office in Yard Office A at the crest of the hump) presses a selector button that puts coded cab signal energy on the receiving track upon which the train is standing. This code controls the cab signal to repeat the aspect of the hump signal. When ready, the hump conductor confers with the hump-engine crew by radio, and clears the hump signal to green (hump fast—4 mph).

As the train moves toward the hump, it passes over a self-restoring dragging-equipment detector, and between two car-inspection pits where men check the running gear and underframes of the cars. They have intercommunications to the hump conductor enabling them to inform him of mechanical irregularities which may affect the movement of the car through the retarders, or of bad-order cars.

The train ascends a 3% grade for 117 ft to the crest of the hump. When the first car enters a track circuit 190 ft long in approach to the crest of the hump, the hump signal automatically changes to yellow (hump slow—2 mph), and the cab signal changes accordingly. An air whistle at the master retarder sounds a long blast when the approach track circuit is occupied, thus warning men working in the yard that humping operations are to begin. The cab signal change in the locomotive is accompanied by a short blast of an air whistle, which sounds whenever the cab signal aspect changes.

The hump conductor directs pin-pulling operations from his office, the pin puller being in sight of the conductor at all times and receiving verbal instructions from him over a paging system. The conductor also sets up the car routes on the automatic switching control machine, which can store as many as five routes at one time. This information is visually displayed simultaneously on both the hump conductor's and the retarder

Humping & Weighing—



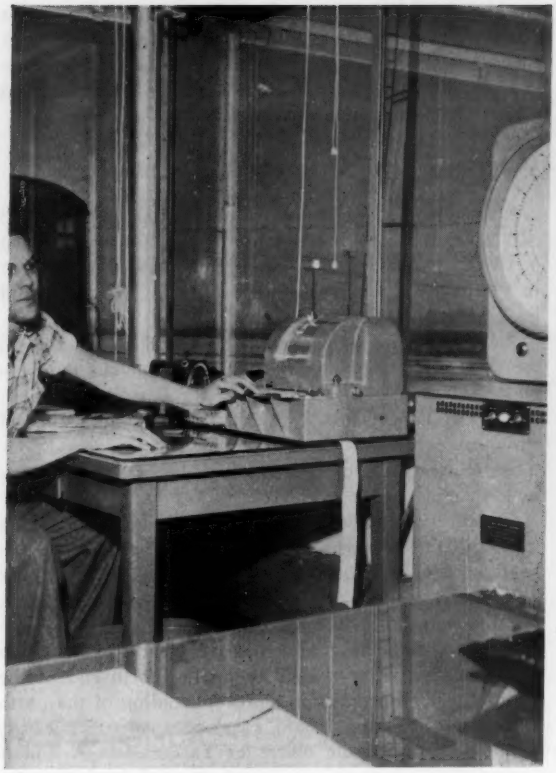
HUMP ENGINEMAN receives instructions from hump conductor by radio. Cab signals repeat hump signal aspects.

operator's machines. The hump conductor also controls the hump and trimmer signals.

As the cars pass over the hump, they go down a 3% grade, and over an automatic electronic scale. As the cars leave the scale, they pass over an automatic weight detector in approach to the master retarder. The weight detector records the car weight as light, medium or heavy, and sets up automatic braking action which is applied to the master and intermediate retarders, according to the weight recorded for the car or cut of cars, thereby governing the speeds of the cars or cuts leaving these retarders.

Through the master retarder the grade is 3.71%. As the cars leave the master retarder, they drop down an average grade of 1.5% through the intermediate retarders, and down a 1.3% grade through the final or group retarders. The speed at which cars leave the group retarders is determined by retarder speed control. The relative weights of cars, as measured by the weight detector, are indicated by lamps on the retarder operator's control panel.

Also, the retarder operator has information on the rolling resistance of each car or cut of cars which is indicated by lamps on his panel. Two types of equipment are used to measure the rolling resistance. One is a Union Switch & Signal development that continuously measures the speed and acceleration of cars rolling down the grade in approach to one of the intermediate retarders. Another device is an accelerometer of Seaboard design which relies upon 19-ft 6-in speed measur-



SCALE CLERK positions printer for tare weight and gross weight is automatically printed on scale ticket.

LOAD CELLS incorporating strain gages are attached to I-beams supporting the rails, which take the load.

ing track circuits in approach to intermediate and group retarders. Also on the operator's panel are lamps indicating the extent of occupancy of each classification track (1¼-½-¾ and full) so that he knows approximately how far each cut of cars must go before coupling with cars standing there.

By these means the retarder operator has information on (1) relative weight of cars, (2) rollability of cars, and (3) fullness of classification tracks. On his panel, as applying to each of the seven group retarders, there is a set of six small toggle levers which, when thrown, determine the action of the retarder so that a car or cut of cars leaves the retarder at a predetermined speed. These speeds are 4, 6, 7, 8, 9, and 11 mph. Based on information indications on the panel before him and circumstances as he can observe them out of his window, the operator moves one of the toggle levers to select the release speed desired.

Special Moves at Hump

All cars are humped except stock cars and cars of explosives, for which special tracks run off the hump lead. At stock pens on the stock track cattle may be taken out of the cars for rest, feeding and watering. Cabooses are humped as regular cars.

When the dragging equipment detector operates, an alarm rings in the car inspection pits, on the hump conductor's machine and the retarder operator's machine, and the hump and cab signals change to red (Stop). The bells ring until acknowledged by the hump conductor. In the inspection pits, the car inspectors can also shut off the pit bells. After the train is inspected, and the trouble remedied, the hump conductor clears the hump signal to resume humping operations.

When cars are to be weighed (and so noted on the switch lists), the hump conductor tells the pin puller to cut these cars separately, so that each "weigh" car goes alone. The scale clerk in a ground-floor office (in Yard Office A) opposite the crest of the hump writes the car initial and number on a scale ticket, and inserts the ticket in the scale printer. He positions the printer for the proper tare weight. Photoelectric eyes at each end of the scale are in the scale-control circuit so that when a car is between the "eyes," having passed the first "eye," but not the second, the car is weighed and the gross and tare weight are printed on the scale ticket. The scale is normally on "standby" and is placed in "weigh" by the scale clerk for weighing, which is done automatically. Cars humped at 2.6 mph can be weighed, and the scale can weigh cars up to 65 ft long without a reduction in the humping speed.

The electronic scale for motion weighing is 95 ft long on a 3% grade, and is 35 ft from the crest of the hump. The rails rest on I-beams that take the load. The load cells, attached to the I-beams, incorporate strain gages to form the load receiving elements. These cells are electrically connected to the weight indication and recording instrument. Eight strain gages, four under each rail, are affected by the load. Each gage has a

HUMP CONDUCTOR routes cars by automatic switching.

RETARDER OPERATOR controls the speed at which freight car are released from the group (or final) retarders.

working range of 250,000 lb. A dial in the scale clerk's office indicates the gross weight of the car, and a printer records on a scale ticket this weight in addition to the tare weight, date and time. The scale was manufactured by Cox & Stevens Aircraft Co.

Departure Yard Operations

In making up outbound trains, switch engines pull cars from the south end of the classification yard, past Yard Office B and into the departure yard. Cars are put in station and connection order from the head end back.

As these cars move past Yard Office B toward the departure yard, a yard clerk reads off car numbers and initials into a handset which controls a Soundscriber in Yard Office A. In this manner, all outbound trains are checked. The yard clerk has a ground-floor office in Yard Office B from which he can see the outbound trains being made up.

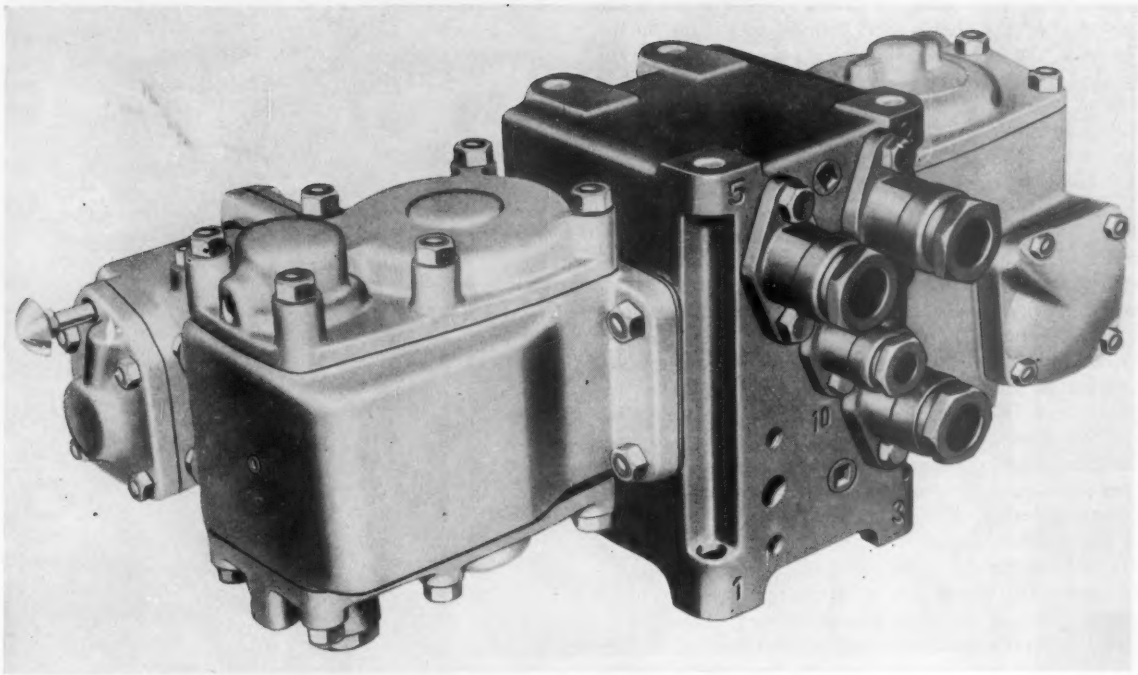
A clearance indicator ("stop shove" signal) for each track of the forwarding (departure) yard is at the south end of the yard, and displays yellow until cars are shoved within 400 ft of the north end of a track. At this point, the indicator light for that track is extinguished, indicating that there is just enough room for a locomotive or a caboose on the north end of the train. These clearance lights prevent fouling of the north end departure yard lead. Track-occupancy indication lamps are also in the offices of Yardmasters A and B to indicate occupancy of departure yard tracks.

After the road locomotive and caboose are coupled on and air brakes are tested, the train departs on one of two departure tracks, either northbound for trains for Raleigh and north, or southbound for trains going south, east or west. The trains leave through interlockings remotely controlled by the Raleigh dispatcher.

The car checker's consist list is transcribed and checked with the waybills, and then a consist list is prepared. It is sent by Teletype for northbound trains, to Raleigh, Richmond and Norfolk; for southbound trains, to Savannah; and for westbound trains, to Atlanta.

A local classification yard of six tracks, having a total capacity of 182 cars, is situated east of the departure yard. Here local freights and Hamlet lcl transfer cuts are made up. Engines working here do not interfere with other yard operations.

The general design and engineering of Hamlet yard was carried out under the jurisdiction of W. D. Simpson, chief engineer, with work in the field directed by J. F. Chandler, resident engineer. Signaling, communications and electrical (including flood lighting) design, construction and installation work was carried out under the jurisdiction of J. R. DePriest, superintendent communications and signals, with signal work in the field directed by A. V. Wilson, supervisor of signal construction. Electrical communication work in the field was directed by R. C. Greene, signal and communications inspector. The retarders and other signaling equipment were furnished by the Union Switch & Signal Division of Westinghouse Air Brake Company. The yard loudspeaker systems were furnished by the Electronic Communication Equipment Company.



WESTINGHOUSE DEVELOPS AC BRAKE VALVE

An Advance in Freight Braking

- **Compatible with AB brake, with added functions**
- **Brake release at low speeds keeps trains moving**
- **Diaphragm pistons and spool valves decrease maintenance**
- **Single-car release and reapplication useful in yard**

An improved air-brake control valve for freight cars which operates in complete harmony with the present standard AB brake but with removable portions approximately 40 per cent lighter in weight has been developed by the Westinghouse Air Brake Company, Air Brake Division, and placed before the AAR for its consideration.

The valve, designated AC, provides positive brake operation with extremely rapid serial release action, is simpler in design, and is less costly to maintain. The main parts of the AC valve are made of aluminum. Ring-packed pistons are replaced by diaphragm pistons. Except at two locations, slide valves are replaced by spool valves, with rubber seal rings.

The AC brake valve performs essentially the same functions as those performed by the AB valve. The arrangement of the elements, however, has been changed and simplified. For instance, in the AB valve the in-shot piston and valve and the quick service limiting valve are separate features. These are combined in the AC valve, but a choke arrangement allows them to function at substantially the same cylinder pressure as in the AB.

The emergency section of the AB valve includes a piston, slide valve and graduating valve. In the AC valve the emergency diaphragm piston moves a small two-port slide valve and the remaining functions of the large slide valve in the AB equipment are performed by two spool valves packed with rubber seal rings.

In the AB valve the air strainer is in the pipe bracket portion. In the AC valve the brake pipe is connected directly to the vent valve in the emergency portion by a large passage, then through the strainer to other brake-pipe passages so that the air flow to the vent valve is unrestricted.

The three-stage build-up of emergency pressure, which is effected by the AB valve, has been changed to two stages in the AC valve. In the initial stage air from both auxiliary and emergency reservoirs flows to the brake cylinder by two routes. This accelerated build-up of brake-cylinder pressure is terminated when the in-shot limiting function cuts off one route at 13-lb cylinder pressure. Thereafter, the build-up continues from both reservoirs through the brake-cylinder control choke at about the same rate as with the AB. The maximum cylinder pressure of 60 lb remains the same.

Another change which contributes to the rapid serial release of brakes after a service application is the dumping of emergency reservoir air into the brake-pipe side of the service diaphragm piston instead of into the auxiliary reservoir space as is the case in the AB valve. This contributes to the rapid build-up of brake-pipe pressure in each car, inducing a rapid and positive movement of each service diaphragm piston and slide valve to full-release position.

On a freight train of 150 cars brakes on cars at the rear end of the train begin to release 9 sec after those at the head end of the train. This compares with an interval of 50 sec on a train of the same length equipped with AB valves and requires a pressure wave traveling through the brake pipe at a speed approaching the velocity of sound. This permits release of a brake application at low speed instead of coming to a complete stop to avoid train damage, as is the present practice. The accelerated release feature does for the release function what quick service does for the application.

A new feature of the AC brake valve is the brake-cylinder release portion, which combines two functions available in the AB valve and adds an important third function. This comprises a diaphragm-piston-operated release valve, a manually operated triplex release valve, and a manually operated reapplication valve.

The triplex release valve, operated by a single handle, permits an overcharge to be released or both auxiliary and emergency reservoirs to be drained completely, or brake-cylinder pressure to be released without loss of reservoir pressure when breaking up trains. The selection between the functions is automatic, based on the presence or absence of brake-pipe pressure. By the use of the manually operated reapplication valve, in the absence of brake-pipe pressure, the brakes may be reapplied for piston-travel readjustment. When brake-pipe pressure is restored following operation of the release valve, the AC valve resets automatically for proper train operation without reapplication of the brakes.

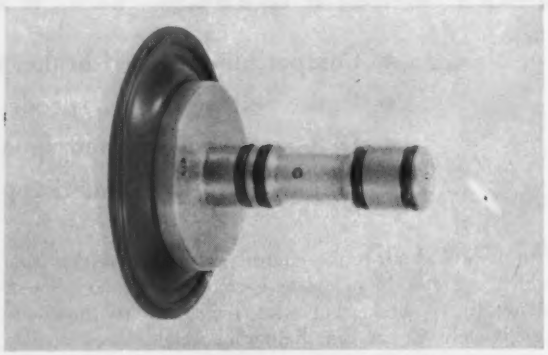
The use of diaphragm pistons instead of sliding pistons fitted with rings results in substantial maintenance savings. Piston regrooving, ring fitting, and piston-chamber rebushing are completely eliminated. The diaphragms of synthetic rubber provide long piston travel and, being free from friction and leakage, are highly sensitive. The spool valves, packed with rubber "O" rings, and the bushings in which they operate are subject to little wear. The relatively large emergency slide-valve bushing is ring packed and can be readily removed and replaced.

The main diaphragm pistons operate vertically, which improves uniformity and stability. In addition to improvement in brake operation, these features should also permit longer intervals between required cleaning periods.

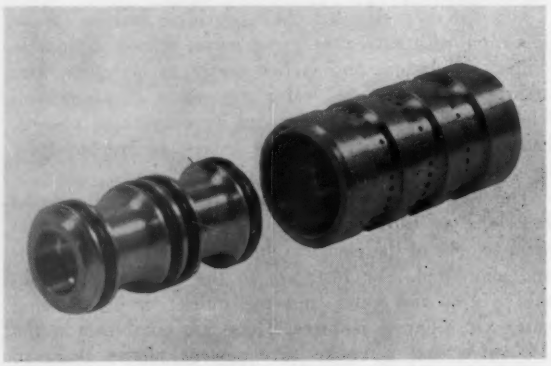
Wherever controlled rates of air flow are required replaceable chokes are employed. Their size can be readily adapted to various sizes of brake cylinders.

The primary market for the AC valve will be for application on new freight cars. The manufacturer believes, however, that its potentially superior performance and lower cost of maintenance will make it attractive as a replacement for older AB valves as they require major overhauling.

SERVICE diaphragm piston slide and graduating valves.



RELEASE diaphragm piston and spool valve.



HIGH-PRESSURE spool valve and bushing in the emergency portion of the valve.

THE RAIL JOINT CO. INC.
50 Church St., New York 7, N. Y.

READ 'EM AND.....

CHEER

When our rail diesel car RDC first went into service, about five years ago, railroads set up a detailed system for keeping track of costs. At the same time they set up a comparable system to see what the same operation would have cost them without RDC. Without exception, the RDC figures provide pleasant reading.

We have always been impressed by the generosity of these RDC-owning railroads in sharing their operating figures with us.

For example, the Baltimore and Ohio has just reported to us the result of their operation of ten RDCs for the first ten months of 1954—January through October.

The reduction in out-of-pocket expense is more than 38%. Combined with increased revenue from the traffic RDC attracted, the railroad's net gain for the period almost equalled the purchase price of three RDCs.

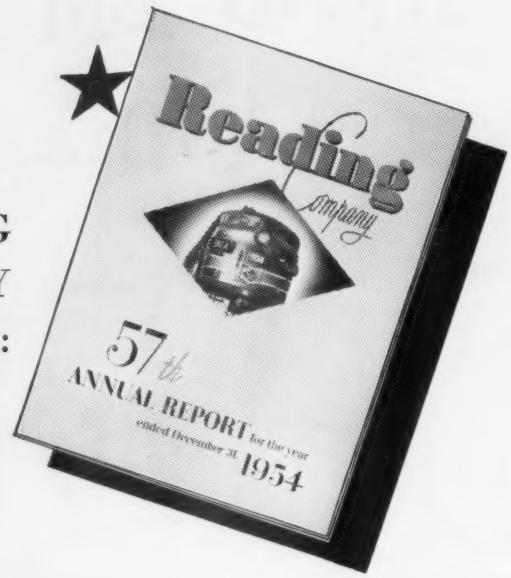
The reduction in cost-per-train-mile, which includes savings in terminal expense, was 44%.

In providing these figures, the railroad made one particularly significant comment. The engines in the RDCs which went into service in January, 1951, are performing just as satisfactorily as the engines in the newest cars received late in 1953. Which compliments both the engines and the B&O's excellent maintenance.

The Budd Company, Philadelphia 15.

Budd

READING
COMPANY
REPORTS:



HIGHLIGHTS *for* 1954

The Company's gross revenues were $109,486,020, an 18% decrease from 1953, reflecting the lower level of business activity. Earnings per common share were $4.56 compared with $6.92 in 1953.

New equipment was added during the year to meet shippers' needs and trailer-on-flat-car service was started between Philadelphia-Camden and Chicago.

The Company's total debt was reduced by $6,124,557 during the year, and the net working capital (excluding materials and supplies) was improved.

Through the efforts of the Company's Industrial Development Department, 35 new industries were located on Reading lines during the year.

Dividends of $2.00 per share were paid on both the Preferred and Common Stocks, making the 49th consecutive year in which dividends have been paid on all classes of stock.

Sources of operating dollar:

	1954	1953
Anthracite	12.8¢	13.1¢
Bituminous Coal.	22.0	20.4
Merchandise	52.1	55.2
Passenger	6.1	5.3
All Other.....	7.0	6.0
Total 100.0		100.0

J. A. Fisher

President

Reading Company

• READING TERMINAL, PHILADELPHIA 7, PENNSYLVANIA

INADEQUATE water supply, caused by improperly maintained systems, is too often not noticed until fire breaks out; then it is too late! This roundhouse could have been saved had provision been made for regular inspection of the water system.

Water Can Be a Burning Issue!

. . . particularly when a water shortage as a result of inadequate supply systems results in several million dollars damage to shops or equipment

By J. DONALD LODGE

How badly can operating facilities be damaged by fire? How much can fire cripple operation? What would happen to operation if a shop building burned and severely damaged 12 or 15 diesel units? How would the railroad operate if a CTC control building were destroyed by fire? What would be the difficulties of operation if a key freight terminal were destroyed by fire?

Railroad officers, aware of such possibilities, tend to place dependence upon water systems believed to be adequate to control a possible fire. However, many piping systems for fire protecting have been in the ground for up to 50 or more years, and a lot can happen to impair their efficiency in that time.

Steps That May Be Taken

In order to avoid such occurrences and bitter disillusionment as to the dependability of water systems available for fire protection, the water installations should be made the responsibility of a competent engineer.

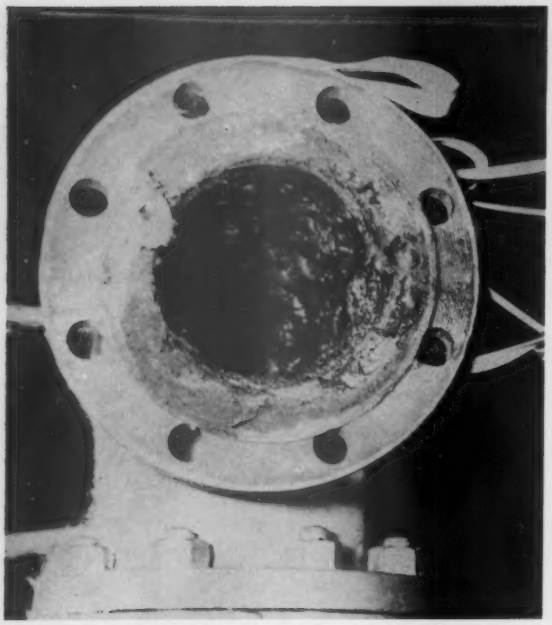
It is first necessary to know the exact status of each water system — location and size of water mains, hydrants, valves, availability of pumps and water supply. This would mean a complete check with whatever blueprints are available, and bringing and keeping them up to date.

A great many water systems for fire protection at railroad shop installations look quite adequate on paper but it may be found that changes in plants have required changes in the water systems which have not been recorded, and also it must be considered that there is steady deterioration due to age of pumps and piping.

The Author

Mr. Lodge is secretary of the Railroad Insurance Association, which is a group of stock fire insurance companies organized for the purpose of insuring the physical properties of railroads against the risk of fire as well as the inland marine perils on diesel locomotives and other rolling equipment.

Mr. Lodge has charge of engineering, which includes loss prevention surveys of railroads insured by the association. A corps of engineers surveys the properties and conducts tests of fire equipment including water systems. The engineering staff analyzes the results of such surveys and advises with railroad men as to the best practical methods of loss prevention.



BADLY ENCRUSTED piping results in inadequate flow.

The sure way to determine if a water system is capable of functioning to its effective capacity as to both supply and pressure is by tests. A practical program of testing water systems at selected periods is a necessity to be sure that the capabilities of a water system are continuously available.

Fire protection engineers advocate separate water systems for fire fighting, but it is generally true that in railroad properties one water system is called upon to serve both domestic and fire protection needs. Unauthorized connections or changes in a water system can quickly decrease its efficiency. It is a necessity that changes or new connections be made only if authorized and recorded by the responsible engineer.

Contact and cooperation with municipal water departments and fire departments are very desirable, particularly where dependence is placed upon municipalities for water supply and fire fighting.

Above all, the importance of adequate water systems for the preservation of property against fire must be realized. The railroads' properties have undergone considerable change due to rapid dieselization. Many processes now are under one roof of large unbroken area. Some new hazards have been introduced, while certain other hazards have been eliminated, but certainly much more value is now concentrated in one location subject to fire. It is also true that there has been greater concentration of important operating units which are susceptible to fire damage in one location. All these factors emphasize the necessity for definitely allocating the responsibility for the installation and maintenance of water systems, in order to prevent possible destruction of invaluable facilities and to prevent impairment of operation.

Maintenance of water systems must include keeping hydrants, valves, pumps and all fire fighting equipment in condition for instant use. Frequent tests of gasoline driven booster pumps are necessary. Checks must be made to see that wrenches to fit hydrants are available. Checks of other auxiliary equipment, such as supply of spanners and proper sizes nozzles, are important.

What Protection Engineers Have Found

DO ANY OF THESE CONDITIONS EXIST ON YOUR PROPERTIES?

Fire protection engineers through recent tests have disclosed conditions at railroad shop plants and properties which would impair the functioning of the water system and make fire fighting difficult or impossible. Here are some of the conditions revealed:

Water mains badly encrusted, particularly in smaller sizes.

Water can't flow through a plugged pipe!

Connections to hydrants, which should be not less than 6 in., were only 4 in.

A six-inch pipe has approximately double the capacity of a four-inch pipe.

Layout maps of water systems, including changes, have not been kept up to date.

How can it be known what is underground unless there are proper records?

Locations of valves were not known to local personnel but only to water service men who may be unavailable in case of fire. This is particularly true where changes in the valve arrangements have been made. Also valves have been found which would not operate, although they might be quite necessary in case of fire.

It's a helpless situation when a pump can't deliver its expected capacity or fails during a fire.

A water tank which served as a primary supply for automatic sprinklers had been removed and the city supply for that plant was under such low pressure that a flow reading at a hydrant could not be obtained.

This plant is at the mercy of fire!

City water supplies, formerly adequate decreased to such extent by increased industrial and residential demands that they were quite inadequate for fire protection at railroad properties. No water storage for emergencies had been made available to protect the railroad's investment and operation.

Portable gasoline pumpers have been located at some plants to boost water pressure. In one instance the railroad fire brigade knew so little about the pump it tried to connect fire hose to the suction side. In another case the gasoline engine turned over for a few seconds then refused to move and had to be shopped for major overhaul. Without these pumps there was not sufficient pressure for fire fighting.

Two different sizes of nuts were found on hydrants, in fact both on one hydrant, and no wrench to fit either one. Many times stem nuts on hydrants were so badly worn no wrenches would fit.

Seconds lost at the beginning of a fire may mean hours and thousands of dollars later on.

Equipment & Supplies

(Continued from page 16)

He added that cars may be readily attached to or taken from the train, giving it desirable flexibility in meeting varying traffic demands and making for more efficient operation.

Mr. Symes said that orders for the new train would be placed as soon as detailed specifications are completed.

Class I Roads Installed 121 Locomotives in January

Class I railroads in January installed in service 121 new locomotive units, all diesel-electric, the Association of American Railroads announced. In the same month in 1954 they installed 159 units, all diesel-electric. In December 1954, they installed 90 units, including 89 diesel-electric and one steam turbine-electric.

Class I railroads on February 1, 1955, had 472 new locomotive units on order. These included 462 diesel-electric and 10 electric units. Class I railroads on February 1, 1954, had 486 new locomotive units on order, of which diesel-electric totaled 461, electric 10, and gas turbine-electric 15.

Supply Trade

Marshall A. Norby, sales representative of **Industrial Brownhoist Corporation,** at Chicago, has been promoted to district sales manager there. **Richard E. McCoach,** sales representative at Philadelphia, has been appointed district sales manager at Cleveland. They succeed **A. P. Lyvers** and **J. A. Peppard,** respectively, who become consultants on special assignments.

STANLEY T. FARWELL, who has been named manager of the transportation department of International Business Machines Corporation, at New York. He was previously an accounting machine sales representative in Cincinnati.

William H. Zepp, midwestern district sales manager for **Templeton, Kenly & Co.,** has been appointed western district sales manager, with headquarters in the San Francisco Bay area.

Theodore F. Smith, who has been president of **Oliver Iron & Steel Corp.** since 1938, has retired.

Norman M. Sted, Cleveland district sales manager of **American Steel & Wire Division** of **United States Steel Corporation,** has been appointed assistant general manager of sales.

Armco Drainage & Metal Products, Inc., will begin construction soon on a new steel fabricating plant at Davis, Cal., which will have 42,000 sq ft of working space.

Aeroquip Corporation has organized a Canadian subsidiary, **Prenco-Aeroquip, Ltd.,** at Toronto, it having recently acquired all assets of **Prenco Progress & Engineering Corp.** relating to its flexible hose line and self-sealing coupling business.

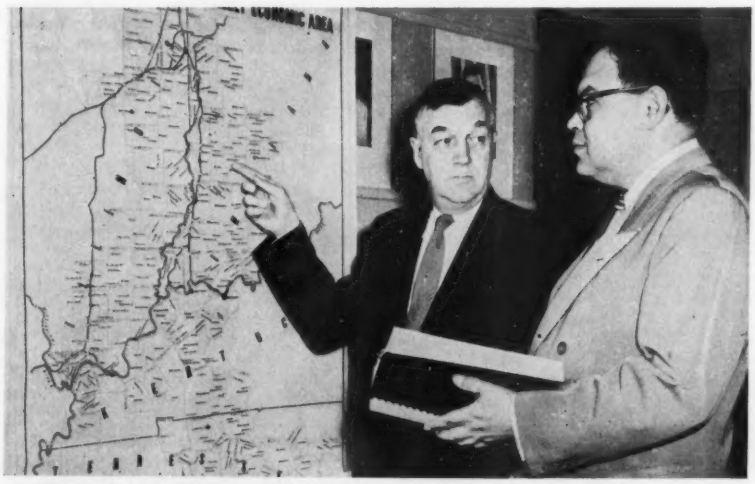
Carroll V. Roseberry has been appointed manager of a newly formed electric utility and transportation sales department of **Westinghouse Electric Corporation. C. F. Sponsler,** formerly manager of the marine and land transportation section of the transportation sales department, has been appointed manager of the transportation section of the new department.

Harry R. Rowland, assistant general manager of sales, **A. M. Byers Company,** has been elected general manager of sales, and **Edgar L. Fix,** assistant manager steel sales, has been named manager steel sales. **H. A. Cochran,** traffic manager, has retired.

William G. Herzig, manager of railroad sales of **Fairbanks, Morse & Company,** has been appointed manager of the railroad product sales department, railroad division, with headquarters as before at Chicago, succeeding **J. F. Marquitz,** retired.

OBITUARY

Frederic Schaefer, 77, president of Schaefer Equipment Company, died at his summer home on Cape Cod, Mass., February 20.



OPPORTUNITIES FOR INDUSTRY abound in the lower Wabash River valley, according to a detailed economic study just completed by the Chicago & Eastern Illinois. President C. M. Roddewig points to map of the area in which Arthur Longini, chief economist for the C&EI, conducted the study. The results have been compiled in a 460-page book.

Abandonments

Delaware, Lackawanna & Western.—The ICC has denied the application of the Citizens Transit Committee for reconsideration of its order authorizing abandonment of this road's Christopher Street ferry service between Hoboken, N.J., and New York City (*Railway Age*, November 22, 1954, page 36). The committee sought an order from the ICC raising the one-way fare for the ferry to 20-cents as a means to forestall termination of the service. The commission, which had postponed the abandonment date, has now fixed it for midnight, March 15.

Chicago & North Western.—Examiner J. L. Bradford has recommended in a proposed report to the ICC that this road's application to

abandon a 33.3-mile segment of its Sleepy Eye branch in South Dakota be denied. He stated that in view of the apparently profitable operation of the entire branch, the road ought to seek additional traffic and revenue through improvement of its service. The segment which the C&NW seeks to abandon extends between Gary, S.D., and Watertown Junction.

Authorizations

ELLENVILLE & KINGSTON (New York, Ontario & Western).—To abandon 240 feet at the end of its main line in Kingston, N. Y., to facilitate sale of railroad station premises there.

MISSOURI PACIFIC.—To abandon a 3.3-mile segment of its subsidiary Chester & Mount Vernon line between M.V. Junction and Menard, the right of way of this segment to be used in a contemplated relocation of the Missouri Pacific main line now paralleling it.

NEW YORK CENTRAL.—To abandon the 3.68-mile segment of its line between Meigs, Ohio, and Rockville. The Central would maintain as a spur that portion of the line between Meigs and Rutland—1 mile—and would dismantle the section between Rutland and Rockville.

NORTHWESTERN PACIFIC.—To abandon a 1.4-mile branch from Almonte, Cal., to Mill Valley.

READING.—To abandon 2,800 feet of its Hunters Run Branch west of Toland Station, Pa.

FIRST SHIPMENT from the new White Pine (Mich.) copper smelter left in a heavy snowfall over the new 14½-mile branch built by the Duluth, South Shore & Atlantic (*Railway Age*, **December 20, 1954, page 26).**

New Facilities

GN Will Build New Yard At Minot, N. D., Soon

About April 15, or as soon thereafter as the weather permits, the Great Northern will start construction of a new $6 million freight classification yard at Minot, N.D. Located just east of the city, the new yard will cover an area of about 470 acres to the north of the present main line.

The new yard will include:

- Six receiving and departure tracks.
- 40 classification tracks.
- A 14-ft hump with one master and four group automatic retarders.
- Automatic push button switch control equipment.
- Eight tracks for coal and grain to be held or inspected.
- A 102- by 600-ft freighthouse and transfer platform.
- A 144- by 300-ft car repair shop, plus tracks for cleaning and conditioning freight cars.
- Diesel locomotive service facilities.
- Floodlighting of entire area.
- A communications system including two-way radio, paging and talkback speaker system, automatic telephones, Teletype and a pneumatic tube message system.
- A yard office building combined with the retarder control tower.

Operation—The yard will centralize the classification of both east and westbound main line freight trains at Minot. While the trains are being classified, freight forwarder cars from eastern points will be placed at the freighthouse transfer platform for consolidation and redistribution of lading for points west of Minot.

By concentrating operations at Minot, the GN expects to be able to accelerate freight operations. Minot is a focal point for main lines from Minneapolis, St. Paul, Duluth, Superior and Grand Forks from the east; from Great Falls, Billings and Butte, and from the Pacific Northwestern terminal cities.

Great Northern Completes Main Line Radio

End-to-end radio communication is now in service on all through freight trains on the Great Northern's 1,765-mile main line between Minneapolis and Seattle.

Forty-six wayside radio stations are now in service on more than 60 per cent of the main line between Minneapolis and Havre, Mont., and between Wenatchee, Wash., and Seattle. Thirty wayside radio stations between Havre and Wenatchee are being installed this year. Thus by the end of 1955 end-to-end and train-to-wayside radio communications will be in service on through freight trains on the GN main line between Minneapolis and Seattle.

Electric locomotives used between Wenatchee and Skykomish, Wash., are radio equipped as are two ditching machines used on the Cascade division. Hillyard at Spokane, Wash., and the ore yards and docks at Superior, Wis., were radio equipped in 1954. Road train and wayside radio was installed in 1953 on the iron ore route between Northern Minnesota mines and Superior.

In the future radio installations are to be made on the railway's coast line between Everett, Wash., and Vancouver, B. C., with wayside stations at Burlington and New Westminster. Interbay yard at Seattle is also to be radio equipped.

Financial

"Subsidy Is Evil," Says Wayne Johnston

"When you are on the side of the angels, keep fighting," Wayne A. Johnston, president of the Illinois Central, told Boston security analysts last week.

"The railroads," Mr. Johnston said, "have been handicapped by two main forces beyond their control to change—subsidy and outmoded regulations. A great deal of honest complaint has been voiced by the railroads about the unfairness of subsidized transportation. . . . There have been signs in some quarters of the industry of giving up the fight. There have been suggestions that, since competitors of the railroads receive benefits from the public purse, the railroads too should receive handouts.

"The answer of the Illinois Central to this proposal is simple. We believe all subsidy to transportation is inherently evil. It has the immediate result of raising our taxes and of encouraging the less efficient at the expense of the more efficient. It has the dangerous long-range result of driving all transportation closer and closer into the arms of government operations and eventual socialism. On the Illinois Central we are not giving up the fight. Only in the defeat of subsidy can the railroads prove their true position as the most broadly useful and economic form of transportation."

Alleghany Corporation. — *Stock Exchange.*— This company has applied to the ICC for authority to issue 1,367,440 shares of 6%, $10 par convertible preferred to be exchanged on a 10-for-1 basis for 136,744 shares of 5½%, $100 par cumulative preferred now outstanding. Alleghany in-

formed the commission that its dividend arrearages on the cumulative preferred amounted to $130.625 per share or a total of $17,862,185 as of January 31. Exchange of the new issue would reduce or eliminate those arrears and put the company "on a current basis for the first time in over 20 years," Alleghany stated. The corporation plans to pay dividends of $5.50 per year on the new stock, if earned. Alleghany also applied for authority to issue 14,768,352 shares of common stock to allow for the ultimate conversion of the 6% shares on a basis whereby Alleghany would receive $3.75 for each share converted and would issue a now-unspecified amount of common stock for each share so converted.

Breswick & Co., independent investor, has been denied the right to intervene in opposition to this company's application to retain carrier status before the ICC (*Railway Age*, February 21, page 16).

"OFFER THE SHIPPER EVERY POSSIBLE SERVICE"

"With the battle for business what it now is between rails and other transportation agencies, railroads must recognize the impelling necessity for meeting competition not only cost-wise, but service-wise as well to whatever extent they can.

"I do not mean that railroads should overlook any opportunity for cutting both maintenance and transportation costs so as to reasonably cope with declining revenues. But I do maintain that these efforts . . . should not be pursued to the point of no return. . . . I feel railroad management, by and large, pursues a shortsighted policy during periods of declining economy when it attempts to shrink operations to such an extent that shippers are denied a service they should expect railroads to provide. By so doing, management opens the door to other agencies of transportation, with a resultant erosion of rail traffic.

"We in management must be more positive, more progressive and daring in our planning for the future. With an eye for profit, we must be prepared to offer the shipper every possible transportation service it is possible for us to provide. . . .

"My overall philosophy accepts the fact that motor carriers are here to stay and that railroad management must make up its mind to coordinate its rail service with truckers by offering them the advantages of rail-truck service. There are definite economies to be gained for the whole transportation industry through this operation. . . ."—*From an address to the New York Society of Security Analysts by Donald V. Fraser, president, Missouri-Kansas-Texas.*

Investment Publications

[The surveys listed herein are for the most part prepared by financial houses for the information of their customers. Knowing that many such surveys contain valuable information, *Railway Age* lists them as a service to its readers, but assumes no responsibility for facts or opinions which they may contain bearing upon the attractiveness of specific securities.]

W. E. Burnet & Co., 11 Wall street, New York 5.

Green Light for Rails, by Arthur Jansen, in Current Position of Railroad Securities, January 19.

L. F. Rothschild & Co., 120 Broadway, New York 5.

The New York, Chicago & Saint Louis Railroad Company Common Stock. February 16.

Smith, Barney & Co., 14 Wall street, New York 5.

Railroad Stocks. Railroad Bulletin No. 183, February 1.

Railroad Bond Exchange Suggestion. Railroad Bulletin No. 185, February 8.

Missouri Pacific Railroad Company. Railroad Bulletin No. 184, February 7.

Chicago & Eastern Illinois Railroad. Income Debenture 5s, 2054. Railroad Bulletin No. 186, February 16.

Securities

Chicago, Rock Island & Pacific.—*Debenture Issue.*—The ICC has exempted this road from competitive bidding requirements in connection with a proposed issue of $65,000,000 of 40-year income debentures (*Railway Age*, January 24, page 43). Proceeds of the sale of the debentures would be used to redeem at $105 per share, plus applicable dividend, 619,047 shares of outstanding preferred stock. The road proposes to have the entire issue underwritten. The commission noted in its authorization that its action is not to be taken as approval of the contemplated stock issue.

Authorization

CENTRAL OF GEORGIA.—To assume liability for $930,000 of equipment trust certificates to finance in part six 1,750-hp diesel-electric freight locomotives to be purchased from the Electro-Motive Division of General Motors Corporation at an estimated total cost of $1,174,446. The certificates, dated March 1, would mature in 15 annual installments of $62,000 each, beginning March 1, 1956. They would be sold at competitive bidding, the interest rate to be determined by such bidding.

Dividends Declared

CHICAGO, ROCK ISLAND & PACIFIC.—common, $1.25, quarterly; 5% preferred A, $1.25, quarterly; both payable March 31 to holders of record March 11.

CLEVELAND, CINCINNATI, CHICAGO & ST. LOUIS.—5% preferred, $1.25, quarterly, payable April 29 to holders of record April 8.

ERIE.—37½¢, quarterly, payable March 31 to holders of record March 3.

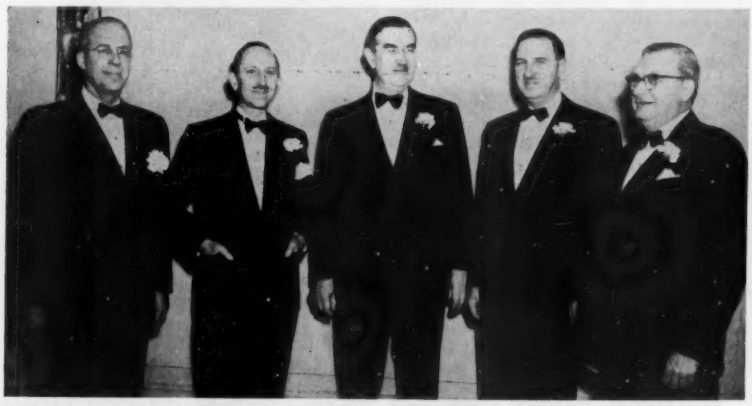
NORFOLK SOUTHERN.—30¢, quarterly, payable March 15 to holders of record March 1.

NORTH PENNSYLVANIA.—$1, quarterly, payable February 25 to holders of record February 18.

ST. LOUIS SOUTHWESTERN.—5% non-cum. preferred, $5, annual, payable March 4 to holders of record February 25.

SOUTHERN PACIFIC.—75¢, quarterly, payable March 21 to holders of record February 28.

ILLINOIS CENTRAL—75¢, common, first quarter (raised from 62½¢), payable April 1 to holders of record March 2.



CANADIAN RAILWAY CLUB DINNER at Montreal, the club's 47th annual function, was attended by some 1,900 officers of railways and supply companies, including (left to right) S. F. Dingle, vice-president, Operation Department, Canadian National; C. G. Marler, Dominion minister of transport; Donald Gordon, chairman and president, CNR; J. C. Kenkel, president of the club and assistant to vice-president, CNR; and D. S. Thomson, vice-president, operation and maintenance, Canadian Pacific.

Security Price Averages

	Feb. 21	Prev. Week	Last Year
Average price of 20 representative railway stocks	90.25	88.98	61.84
Average price of 20 representative railway bonds	98.50	99.02	94.04

Railway Officers

CHICAGO & NORTH WESTERN.—**E. J. Fitzgerald** has been appointed master mechanic, Dakota division, at Huron, S. D.

DELAWARE & HUDSON. — **George D. Hughey,** vice-president and general manager at Albany, N. Y., who contemplates retirement at the end of 1955, has been appointed vice-president in charge of operation, and his former position will be abolished, effective March 1. **John P. Hiltz, Jr.,** chief engineer, maintenance of way, of the New York Central at New York, has been named general manager of the D&H at Albany, having charge of transportation, maintenance and engineering and reporting to Mr. Hughey. Mr. Hiltz was born at Baltimore September 8, 1911, and attended Baltimore Polytechnic Institute (1929) and Carnegie Institute of Technology (B.S. in C.E., 1934). He entered railroad service with the Pennsylvania in June 1934 as assistant on engineer corps, and joined the Lackawanna in March 1945 as engineer track, later becoming engineer maintenance of way. Mr. Hiltz became chief engineer maintenance of way of the NYC at New York in February 1953.

John P. Hiltz, Jr.

GREAT NORTHERN. — **R. A. Johnson,** assistant superintendent signals at St. Paul, has been promoted to superintendent signals there, succeeding **P. G. Seaholm,** who has retired after more than 36 years of service. Mr. Johnson's successor is **J. R. Thomas,** office engineer, signal department, who in turn has been replaced by **C. E. Anderson.**

C. M. Rasmussen, superintendent, Butte division at Great Falls, Mont., has been promoted to assistant general manager, Lines West at Seattle. His successor is **H. J. Surles,** general safety supervisor at St. Paul, Minn., who in turn has been replaced by **J. T. Andrew,** western territory safety supervisor at Spokane.

ILLINOIS CENTRAL.—As *Railway Age* reported February 7, page 56, **Norman E. White** has been appointed freight traffic manager at Chicago. Mr. White joined the IC in 1926 as stenographer; after serving in various other capacities, he became assistant general freight agent, general freight agent, and assistant freight traffic manager, successively.

Norman E. White

NEW YORK CENTRAL.—**J. H. Sawyer,** assistant engineer, signal department at Cleveland, Ohio, has been promoted to office engineer, system. **M. H. Work,** assistant engineer in the signal engineer's office at Springfield, Mass., has been named assistant engineer in the office of acting chief signal engineer at Cleveland.

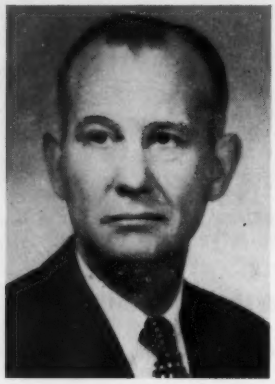
Joseph M. Ian has been appointed to the new position of manager of insurance at New York. Mr. Ian has been vice-president and broker for R. H. Squire Inc., New York, since 1949.

PITTSBURGH & LAKE ERIE.—**Harry G. Wheatley** has been appointed manager industrial development, and **Robert E. Rogers** coal traffic manager, both at Pittsburgh. The position of general freight agent and manager industrial development, formerly held by Mr. Rogers, has been abolished. **Bernard V. McCann,** assistant to freight traffic manager, New York Central system and P&LE at Pittsburgh, has been appointed assistant general freight agent there. **Mark L. Kelly** succeeds Mr. McCann as assistant to freight traffic manager.

PIEDMONT & NORTHERN.—**J. Emett Griffin,** traveling freight agent of the Durham & Southern, has been appointed district freight agent of the P&N at Augusta, Ga., succeeding **Charles D. Peaseley, Jr.,** who has been named commercial agent at Greenville, S.C.

SOUTHERN PACIFIC.—**Clifford H. Reeves,** district freight agent, has been appointed assistant general freight agent, Oakland district. Mr. Reeves' successor is **Frank M. Guerin,** assistant district freight agent, who in turn has been replaced by **Charles A. Hartley,** chief clerk, traffic department, San Francisco district. **Merrill T. Austin,** foreign freight agent, has been named assistant general freight agent, San Francisco district.

J. M. Day, assistant general storekeeper at San Francisco, has been promoted to general storekeeper there, succeeding **Harold J. Smith,** retired. **G. E. Hinton,** assistant general storekeeper at Sacramento, Cal., succeeds Mr. Day, and has been succeeded by **H. N. LaDue,** who transfers from El Paso, Tex.



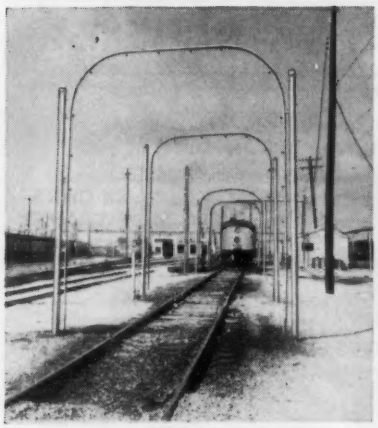
G. D. O'Connor

P. E. Welch, general storekeeper for the SP's Texas & Louisiana lines at Houston, has retired after 33 years of service, and has been replaced by **G. D. O'Connor,** assistant purchasing agent at New Orleans. **William J. McDonald,** division storekeeper at San Antonio, Tex., succeeds Mr. O'Connor.

Herman A. Nelson, assistant auditor of passenger accounts, has been appointed auditor of passenger accounts, with headquarters as before at San Francisco, to succeed **W. W. Willson,** who retires February 28 after more than 50 years of railroad service, nearly 46 of which were with the SP. **Francis T. Collins,** assistant to auditor of miscellaneous accounts, has been appointed assistant auditor of miscellaneous accounts at San Francisco, succeeding **G. M. Fowle,** who retires February 28, after 45 years of service with the SP and its affiliates.

H. V. Overmire, assistant to general purchasing agent at San Francisco, Cal., has been appointed purchasing agent at Portland, Ore., succeeding **Edward H. Polk,** who retires February 28 after 50 years of service. **G. C. Freeborn** succeeds Mr. Overmire as assistant to general purchasing agent at San Francisco.

WESTERN PACIFIC. — **George M. Lorenz,** road foreman of engines at Salt Lake City, has been appointed trainmaster there, and has been succeeded by **Maurice W. Hammond,** who transfers from Portola, Cal. **W. S. Cope,** locomotive engineer, replaces Mr. Hammond. **Robert A. Henderson,** conductor, has been named trainmaster at Keddie, Cal.



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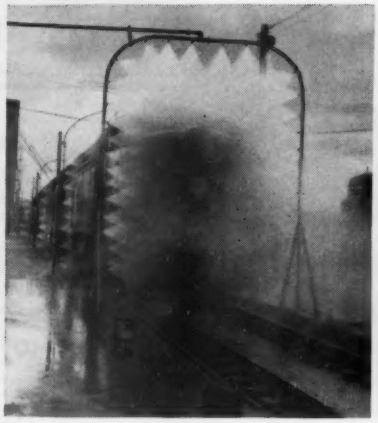
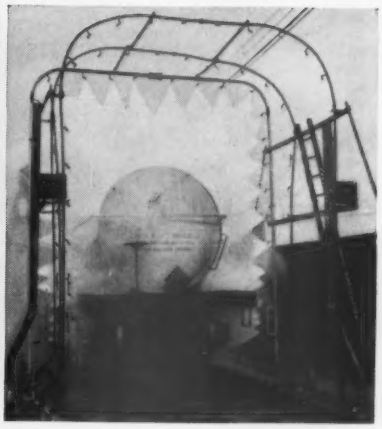


High-pressure spray stand.



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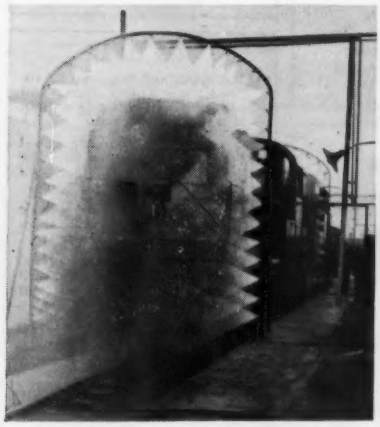

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